







# INDEX OF PATENTS

RELATING TO

# ELECTRICITY,

EMBRACING PATENTS ISSUED BY

## THE UNITED STATES PATENT OFFICE

FROM JULY 1, 1888, TO JUNE 30, 1889.

APPENDIX No. VIII.

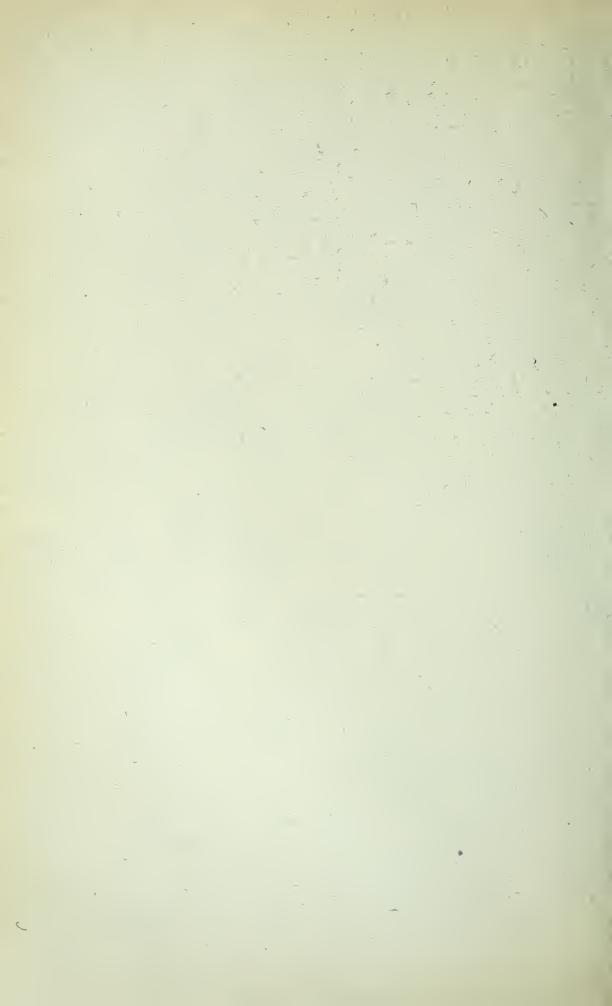
COMPILED UNDER THE DIRECTION OF THE COMMISSIONER OF PATENTS.

282517

WASHINGTON:
GOVERNMENT PRINTING OFFICE.
1890.







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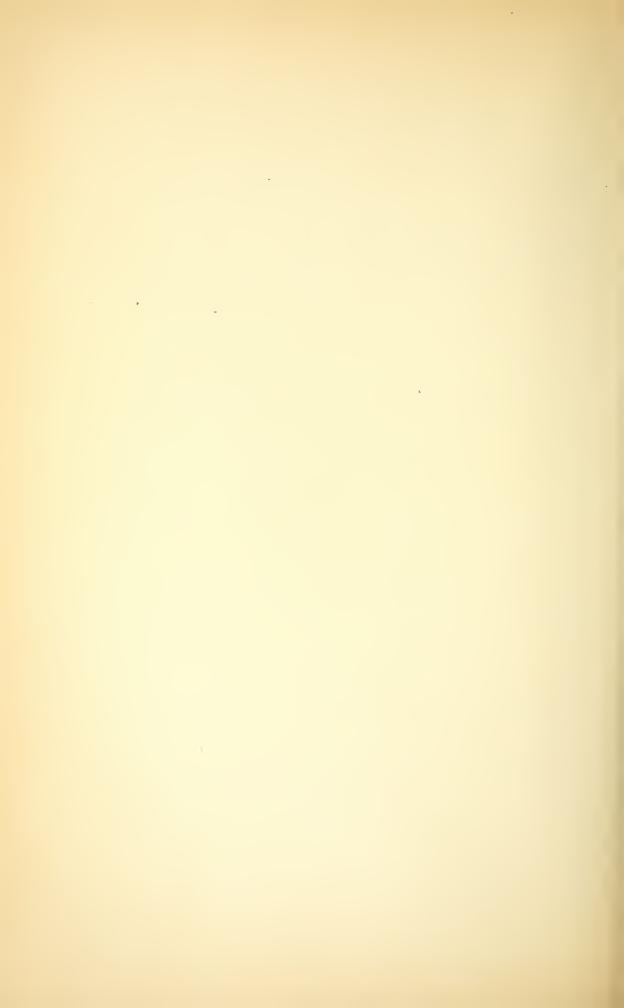
## THE UNITED STATES PATENT OFFICE

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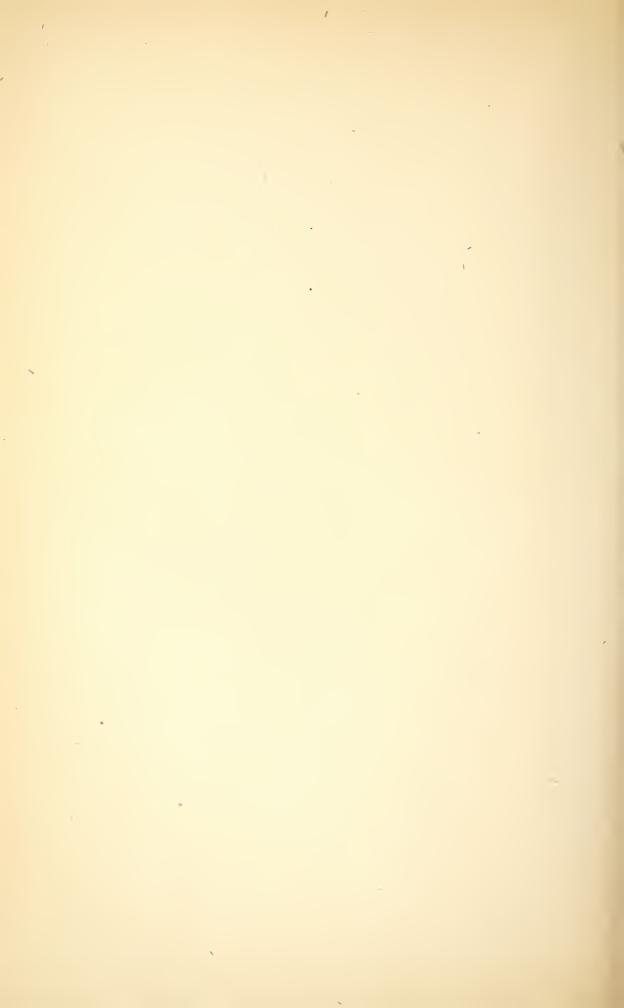
#### ERRATA.

No. 397,049, Cade, B., Railway signals, should read Telegraphy, railway-car, in alphabetical and numerical indexes.

Nos. 388,481 and 389,062, Delany, P. B., Telephones, circuits and systems, should read Telegraphy, circuits and systems, in alphabetical index.

No. 387,265, Stuckert, J. F., Alarms, fire, should read Telegraphy, fire, alarms and extinguishers, in alphabetical and numerical indexes.

No. 400,658, Gennert, E. F., Gas settings, should read Gas fittings, in alphabetical and numerical indexes.



## APPENDIX No. VIII.

#### PART I.

CONSISTING OF A

### SUB-CLASS INDEX OF ALL PATENTS

RELATING TO

## ELECTRICITY

Issued from July 1, 1888, to June 30, 1889, inclusive, giving names of Inventors, and dates and numbers of Patents in each sub-class in numerical and chronological order.



#### CLASSIFIED INDEX

OF

# PATENTS RELATING TO ELECTRICITY

FROM JULY 1, 1888, TO JUNE 30, 1889.

#### 171. GENERATION.—6. BATTERIES—GALVANIC.

No.	NAME.	DATE.	No.	NAME.	DATE.
385,344	Eaton, A. K	July 3, 1888	395,028	Bailey, M. and Warner, J	Dec. 25, 1888
385,760	Kookogey, W. P	July 10, 1888	395,706	Kitsee, I	Jan. 8, 1889
386,090	Roberts, I. L	July 10, 1888	395,769	Coad, T	Jan. 8 1889.
386,149	Meserole, A. V	July 17, 1888	395,835	Kookogev, W. P	Jan. 8, 1889
386,150	Meserole, A. V	July 17, 1888	395,837	Kookogey, W. P	Jan. 8, 1889
386,569	Wheelock, B. J. and J. W	July 24, 1888	396,329	D'Humy, P. R. De F	Jan. 15, 1889
387,049	Carr, R. L. and Borden, P		396,342	Scheithauer, B	Jan. 15, 1889
387,642	Hewett, E. M.	Aug. 14, 1888	396,870	Heinrichs, Ć. F	Jan. 29, 1889
387,643	Hewett, E. M.	Aug. 14, 1888	396,871	Heinrichs, C. F	Jan. 29, 1889
387,654	Overlack, B	Aug. 14, 1888	397,111	Colby, E. J	Feb. 5, 1889
387,839	Woods, G. T	Aug. 14, 1888	397,116	Egan, C. E	Feb. 5, 1889
388,181	Cassard, H		397,489	Clamer, F. J. and Hendrickson,	Feb. 12, 1889
388,312	Scarles, B	Aug. 21, 1888		J. G.	
388,430	Meserole, A. V	Aug. 28, 1888	397,526	Thompson, C. M	
388,628	Carr, R. L. and Borden, P	Aug. 28, 1888	397,945	Sperry, E. A.	
389,140	Eaton, A. K	Sept. 4, 1888	397,969	Cross, E. D	
389,532	Serson, J	Sept. 11, 1888	398,132	Cross, E. D	
389,676	Trippe, S. L		398,737	Kookogey, W. P	Feb. 26, 1889
390,597	Hewett, E. M		400,088	Kammeyer, C. E. K	
390,674	Humphreys, D.		400,126	Shaw, F	
390,675	Humphreys, D.	Oct. 9, 1888	400,215	Imschenetzky, A	Mar. 26, 1889
390,676	Humphreys, D.		400,224 400,225	Kitsce, I	Mar. 20, 1889
390,677	Humphreys, D		400,225 $400,227$	Kitsec, I	
390,748 391,505	Brewer, H. J		400,430	Crosby, E. H	Apr. 2 1990
392,836	Wallace, J. B		401,059	Phalan, J. H	
393,123	Root, F. H		402,104	Pratt, R. J	
202 203	Partley L. C	Nov. 20, 1888	402,166	Kookogey, W. P	Apr. 30, 1889
393,203 393,353	Bartley, L. C	Nov. 27, 1888	402,915	Friedländer, A.	May 7, 1889
393,395	Roosevelt, H. L	Nov 27 1888	403,253	Collé, C	
393,639	Gethins, J. L	Nov. 27, 1888	403,451	Barrett, J. A	
394,296	Rand, E. R	Dec. 11, 1888	403,802	Vetter, J. C	
394,613	Roberts, I. L.		403,868	Arnold, D. J	
394,614	Roberts, I. L. and Brevoort, H. L.	Dec. 18, 1888	403,955	Noble, C. B	May 28, 1889
394,615	Roberts, I. L	Dec. 18, 1888	404,698	Frishmuth, W	June 4, 1889
394,616	Roberts, I. L	Dec. 18, 1888	404,699	Frishmuth, W	June 4, 1889
394,617	Roberts, I. L	Dec. 18, 1888	405,196	Barrett, J. A	
394,638	Brevoort, H. L. and Roberts, J. L.	Dec. 18, 1888	405,246	Childs, W. A.	June 18, 1889
394,670	Wright, R. D	Dec. 18, 1888	405,609	Serson, J	June 18, 1889
394,810	Beattie, J., jr	Dec. 18, 1888			
	171. GENI	ERATION.—72.	BATTERI	ES-SECONDARY.	
385,390	Trippe, S. L	July 3, 1888	392,244	Walter, H	Nov. 6, 1888
385,558	King, F	July 3, 1888	392,573	Thompson, C. H	
386,580	Enos, J. A	July 24, 1888	392,574	Thompson, C. H	Nov. 6, 1888
386,898	Sellon, J.S	July 31, 1888	392,826	Sellon, J. S	Nov. 13, 1888
387,679	Fitch, D. H	Aug. 14, 1888	393,573	Paget, L	Nov. 27, 1888
388,335	Beattie, J., jr	Aug. 21, 1888	393,575	Paget, L	Nov. 27, 1888
388,601	Trippe, S. L	Aug. 28, 1888	393,576	Paget, L	Nov. 27, 1888
388,668	Gibson, C. D. P	Aug. 28, 1888	393,577	Paget, L	Nov. 27, 1888
388,746	Gibson, C. D. P Van Gestel, J. T	Aug. 28, 1888	393,814	Burns, P. C	Dec. 4, 1888
339,186	Askew, C. B. and Pumpelly, J. K.	Sept. 11, 1888	393,954	Woodward, H	Dec. 4, 1888
389,455	Elliott, R. M	Sept. 11, 1888	393,955	Woodward, H	Dec. 4, 1888
389,882	Fanre, C. A	Sept. 25, 1888	394,471	Duncan, L	
391,229	Butler, II. W	Oct. 16, 1888	394,472	Duncan, L	Dec. 11, 1888
392,030	Stout, G. II	Oct. 30, 1888	394,473	Duncan, L	Dec. 11, 1888

171. GENERATION.—72. Batteries—Secondary—Continued.

No.	NAME.	DATE.	No.	NAME.	DATE.
394,474	Duucan, L		399,535	Huber, J. L	Mar. 12, 1889
394,897 395,311	Wiegand, H. H Cameron, H. F. De B		400,226 $400,404$	Kitsee, I Hunter, R. M	
396,367	Roberts, I. L		400,842	Griscom, W. W	Apr. 2, 1889
396,368	Roberts, I. L		400,843	Griscom, W. W	
396,369 396,769	Roberts, I. L.		401,289 401,290	Main, W	
396,770	Sellon, J. S		401,291	Main, W	Apr. 9, 1889
396,958	Sellon, J.S		401,466	Sellon, J. S	Apr. 16, 1889
397,235 397,443	Hunter, R. M.		401,744 $401,953$	Griscom, W. W Kookogey, W. P	
397,557	Knowles, E. R		402,006	Desmazures, C	
397,607	Paget, L		402,484	Schoop, P	
397,608 397,650	Paget, L		402,586	Griscom, W. W Buell, C. E	
397,796	Gibson, C. D. P	Feb. 12, 1889	403,593	Jamieson, A	
397,965	Burnley, W	Feb. 19, 1889	403,957	Price, J. B	May 28, 1889
398,075 398,194	Pederson, J. T	Feb. 19, 1889	404,168	Cameron, H. F. De B. and Harris, T.	May 28, 1889
398,409	Lang, E. M	Feb. 26, 1889	405,213	Hicks, T. H	June 11, 1889
399,052	Knowles, E. R	Mar. 5, 1889	405,751	Van Gestel, J. T	June 25, 1889
399,274	Meserole, A. V	Mar. 12, 1889			
	171. GENERATIO	ON.—74. BATTE	RIES —SEC	CONDARY—APPLICATIONS.	
386,225	Walker, G. W		395,377	Brush, C. F	
387,988 389,356	Pfatischer, M Bickley, C. G		395,378 395,379	Brush, C. F	
389,638	Conant, T. P		395,836	Kookogey, W. P	Jan. 8, 1889
389,935	McDonald, W. H	Sept. 25, 1888	396,213	Lugo, O	Jan. 15, 1889
390,463 390,464	Edmunds, HEdmunds, H		396,214 396,681	Lugo, O Brush, C. F	Jan. 15, 1889
391,468	Griscom, W. W	Oct. 23, 1888	399,755	King, F	Mar. 19, 1889
393,146	Edmunds, H	Nov. 20, 1888	400,395	Currie, S. C. C	Mar. 26, 1889
393,147	Edmunds, H		401,255	Currie, S. C. C	Apr. 9, 1889
393,183 393,470	Stocker, W. F. Griscom, W. W.	Nov. 20, 1888 Nov. 27, 1888	401,332	Currie, S. C. C	
393,744	Currie, S. C. C		402,191	Prescott, G. B., jr	Apr. 30, 1889
393,757	Griscom, W. W	Dec. 4, 1888	402,192	Prescott, G. B., jr	
394,100 394,541	Currie, S. C. C		402,349 404,968	Pfatischer, M Griscom, W. W	Apr. 30, 1889
394,642	Conant, T. P		405,897	Leonard, H. W. and Hanson, A.	
	171. GEN	ERATION.—7	B. BATTER	IES—THERMAL.	
16	1		1		
389,124	Weston, E		394,090	Woodward, H	
389,125	Weston, E	Sept. 4, 1888	398,272	Mestern, M	Feb. 19, 1889
	171. GEN	ERATION.—23	3. Frictio	N GENERATORS.	
398,122	Birdsall, E. T	Fab. 10 1990	405,334	Waite, H. E	Inne 19 1000
401,156	Gläser, H		400,004	Watte, H. E	June 15, 1509
	171. G	ENERATION	-95. GALV	VANOMETERS.	-
386,648	Miot, G	July 24, 1888	394,728	Shallenberger, O. B	Dec. 18, 1888
386,992	Lange, P	July 31, 1888	395,974	Hayes, H. V. and White, A. C.	Jan. 8, 1889
386,993	Lange, P		397,966	Carcy, W. A	Feb. 19, 1889
387,131 389,274	Anthony, W. A	July 31, 1888 Sept. 11, 1888	399,292 400,661	Siemens, W	Apr. 2 1889
390,067	Chisholm, I. W	Sept. 25, 1888	400,662	Gipperich, A	Apr. 2, 1889
390,115	Delany, P. B	Sept. 25, 1888	400,663	Gipperich, A	Apr. 2, 1889
391,592 392,018	Eddy, A. HEmerson, V. H	Oct. 23, 1888	400,980 401,428	Weston, E	
392,385	Weston, E	Nov. 6, 1888	401,617	White, A. C	Apr. 16, 1889
392,386	Weston, E	Nov. 6, 1888	403,311	Weston, E	May 14, 1889
392,387 392,476	Weston, E	Nov. 6, 1888	403,312	Weston, E	
392,477	Weston, E	Nov. 6, 1888	404,860	Pfannkuche, G	
392,478	Weston, E	Nov. 6, 1888	404,861	Pfannkuche, G	June 11, 1889
393,088	Waterhouse, A. G	Nov. 20, 1888			
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# 171. GENERATION.—27. Induction-Coils.

171. GENERATION.—27. INDUCTION-COILS.					
No.	NAME.	DATE.	No.	NAME.	Date.
387,013	Shallenberger, O. B. and Byl-	July 31, 1888	400,862	Lowrie, W. and Hall, C. J	Apr 2 1889
001,020	lesby, H. M.	0 44, 1000	400,972	Thomson, E	
387,123	Thomson, E	July 31, 1888	401,041	Lewin, J. J.	Apr. 9, 1889
388,482	Eisenhart, C. A	Aug. 28, 1888	401,366	Osborn, C. V	Apr. 16, 1889
389,640	Cox, H. B	Sept. 18, 1888	403,492	Smith, T. J	May 14, 1889
389,838	De Ferranti, S. Z.		403,541	Lemp, H	May 21, 1889
395,932	Waite, H. E	Jan. 8, 1889	404,114	Schmid, A.	
397,461 397,910	Gutmann, L	Feb. 10 1880	404,630 404,822	Brown, F. H	
001,010	Gutmann, D	160. 10, 1000	404,022	Brown, F. H	June 11, 1009
	171. GE	NERATION.—	33. Magn	ETO-ELECTRIC.	
905.450	Harding \	July 3, 1888	395,622	Wells I E	In 1 1000
385,458 385,943	Harding, A	July 10, 1888	396,086	Kelly, J. F	
386,340	Miot, G		396,149	Eickemeyer, R	Jan 15 1889
386,685	Brown, C, E. L	July 24, 1888	396,195	Daft, L.	Jan. 15, 1889
386,775	Fritsche, W	July 24, 1888	396,355	Dver. I. T	Jan. 15, 1889
387,010	Schmid, A		396,581	Loomis, O. P	Jan. 22, 1889
.387,343	Crompton, R. E. B	Aug. 7, 1888	396,941	Knowles, E. R	Jan. 29, 1889
387,432	Meston, A. W	Aug. 7, 1888	396,942	Knowles, E. R	
388,093	Waddell, M	Aug. 21, 1888	397,007	Kester, J. F	
388,513 389,011	Van Gestel, J. T	Aug. 28, 1888	397,340 397,392	Cohen, R. L Shallenberger, O. B	Feb. 5, 1889
389,184	Zech, Otto	Sept. 4, 1888 Sept. 4, 1888	397,492	Eickemeyer, R	
389,658	Knight, W. H	Sept. 18, 1888	397,550	Hunter, R. M	
389,752	Lanckert, E. F. H. H		397,705	Edison, T. A	
389,779	Thomson, E	Sept. 18, 1888	398,913	Thomson, E	
389,812	Hicks, T. H	Sept. 18, 1888	399,088	Silvey, W. L	Mar. 5, 1889
389,894	Meyers, W. G. and Coward, F. E		399,213	Robertson, J. II	
389,974	Pfannkuche, G. and A		399,320	Du Laney, G. L.	Mar. 12, 1889
390,180	Mather, W. and Hopkinson, J.	Sept. 25, 1888	399,328	Hayes, J. A	Mar. 12, 1889
390,301	and E.	Oct 9 1999	399,329	Heywood, B	Mar. 12, 1889
390,301	Hill, W.S		399,403 399,404	Higham, D	Mar. 12, 1889
390,414	Tesla, N		399,646	Balet, J. W.	
390,±15	Tesla, N	Oct. 2, 1888	399,800	Thomson, E	
390,439	Bradley, C. S	Oct. 2, 1888	400,130	Silvey, W. L.	Mar. 26, 1889
390,721	Tesla, N		400,139	Stewart, R. E	Mar. 26, 1889
390,906	Ries, E.·E.	Oct. 9, 1888	400,838	Entz, J. B	Apr. 2, 1889
390,912	Shallenberger, O. B		400,973	Thomson, E	
390,955 391,070	Emmner, J., jr		401,317	Weston, E	Apr. 9, 1889
391,270	Pfannkuche, G	Oct. 16, 1888	401,318 401,632	Weston, E	
392,490	Billings, C. E	Nov 6 1888	401,668	Weston, E	Apr. 16, 1889
392,660	Bidwell, B.	Nov. 13, 1888	401,669	Weston, E	
392,765	Thomson, E	Nov. 13, 1888	401,761	Shawhan, J. F	
393,266	Riker, A. L	Nov. 20, 1888	402,066	Coerper, C	Apr. 23, 1889
393,422	Craig, T. E	Nov. 27, 1888	402,200	Statter, J. G	
393,469	Griscom, W. W	Nov. 27, 1888	403,018	Wheeler, S. S	May 7, 1889
393,636	Freeman, W. P	Dog 4 1999	103,487	Perret, F. A	May 14, 1889
393,742 393,745	Collins, W. C	Dec. 4, 1888	403,630 403,905	Willson, T. L	May 28, 1889
393,849	Nutting, S. E	Dec. 4, 1888	404,068	Belding, W. S	May 28, 1889
394,095	Buckingham, C. L.		404,484	Hochhausen, W.	June 4, 1889
394,797	Tregoning, J.	Dec. 18, 1888	404,712	Kester, J. F	June 4, 1889
394,818	Bradley, C. S	Dec. 18, 1888	404,713	Kester, J. F	June 4, 1889
394,819	Bradley, C. S	Dec. 18, 1888	404,714	Kester, J. F	June 4, 1889
394,883	Riethmann, G. W	Dec. 18, 1888	404,715	Kester, J. F	June 4, 1889
394,905	Belding, W. S		405,002	Bishop, W. S	June 11, 1889
394,978 394,999	Hauss, D. J	Dec. 25, 1888	405,284	Thone, F	Tune 18, 1889
395,019	Rice, E. W., jr	Dec. 25, 1888	405,441 $405,471$	Sperry, E. AGleeson, T	June 18, 1889
	Hoffmann, C.	Dec. 29, 1000	405,507	Sandwell, W. D	June 18, 1889
395,123	Edison, T. A	Dec. 25, 1888	405,602	Rosenqvist, C. L	June 18, 1889
395,157	Loomis, F. F	Dec. 25, 1888	406,015	Willson, T. L	June 25, 1889
395,260	Belding, W. S.	Dec. 25, 1888		<i>'</i>	
	•		ETO_ET FO	FRIC-HAND-MACHINES.	
	171. GENERALI	JA 10. DIAGN	ETO-ELEC.	TIMO -TIAND-BIAGHINES.	
336,071	Humans, W	July 10, 1888	394,172	Gray, E	Dec. 11, 1888
388,877	Humans, W	Sept. 4, 1888	396,557	Gmür, B. & Flatz, O	Jan. 22, 1889
391,224	Blair, J. B.	Oct. 16, 1888	400,327	Ginochio, N. B	Mar. 26, 1889

#### 171. GENERATION.—34. METERS.

171. GENERATION.—54. METERS.					
No.	NAME.	DATE.	No.	NAME.	DATE.
00 = 04 =	mi D	T 1 0 1000	005.010	TO TO	D 05 1000
385,647	Thomson, E	July 3, 1888	395,018	Thomson, E	
387,505 388,003	Forbes, G Shallenberger, O. B	Aug. 7, 1888 Aug. 14, 1888	396,403 396,645	Jaequemier, M. J. R. Card, G. F.	Jan. 22, 1889
388,004	Shallenberger, O. B	Aug. 14, 1888	397,538	Cutler, H. H	Feb 5 1889
388,583	Raab, K	Aug. 28, 1888	399,336	Lauckert, E. F. H. H	
388,707	Morris, H. G	Aug. 28, 1888	401,191	Manwaren, A. H	Apr. 9, 1889
389,870	Bishop, J. D.	Sept. 25, 1888	401,225	Smith, W. F	Apr. 9, 1889
391,010	Bentz, H	Oct. 16, 1888	401,226	Smith, W. F	Apr. 9, 1889
392,437	Lange, P.		401,803	Thomson, E	Apr. 23, 1889
392,438 392,439	Lange, P		402,410 403,244	Davis, D L	Apr. 30, 1889
392,577	Wurts, A	Nov. 6, 1888 Nov. 6, 1888	404,310	Sellon, R. P	May 28 1889
393,132	Wagner, F. C	Nov. 20, 1888	404,801	Slattery, M. M. M.	June 4, 1889
393,315	Stocker, W. F	Nov. 20, 1888	405,249	Dahl, Ö	June 18, 1889
394,880	Reckenzaun, A. and Pentz, J. A-	Dee. 18, 1888	405,399	Diehl, R. and P.	June 18, 1889
394,881	Reckenzaun, A	Dec. 18, 1888	406,010	Thomson, E	June 25, 1889
	. 171.	GENERATION	Ñ.—40. Ri	EGULATORS.	
	- 1				
386,602	Parsons, H. W. and Hoduit, J -	July 24, 1888	397,613	Rice, E. W., jr	
387,194	Waterhouse, A. G.	July 31, 1888	397,616	Thomson, E	
387,195 387,853	Waterhouse, A. G. Buckingham, C. L. and Lemp, H	July 31, 1888 Aug. 14, 1888	397,773 398,668	Blades, H. II Sperry, E. A	
389,029	Waterliouse, A. G.	Sept. 4, 1888	398,744	Nutting, S. E	
389,030	Waterhouse, A. G.	Sept. 4, 1888	398,926	Balet, J. W	
389,265	Thomson, E	Sept. 11, 1888	398,927	Balet, J. W	Mar. 5, 1889
390,820	Tesla, N	Oet. 9, 1888	399,147	Kester, J. F	
390,910	Shallenberger, O. B.	Oct. 9, 1888	399,224	Wagner, F. C.	Mar. 5, 1889
390,930	Westinghouse, G., Jr		399,401	Higham, D	Mar. 12, 1889
391,114 391,319	Brush, C. F	Oct. 16, 1888	399,402	Higham, D Dobbie, R. S	Mar. 12, 1889
391,954	Field, S. D	Oct. 16, 1888 Oct. 30, 1888	400,680	Higham, D	Apr 2 1889
392,167	Roberts, I. L.	Oct. 30, 1888	400,726	Balet, J. W.	Apr. 2, 1889
392,370	Sellon, R. P. and Mordey, W. M		401,230	Van Depoele, C. J	Apr. 9, 1889
392,855	Coburn, E. B	Nov. 13, 1888	403,017	Wheeler, S. S.	May 7, 1889
392,890	Stanley, W., jr		403,158	Walter, H. E	
393,448	Pfannkuehe, G		403,836	Gravier, A. T	
394,035 395,492	Van Depoele, C. J.	Dec. 4, 1888	404,120 404,324	Stanley, W., jr	May 28, 1889
396,422	Pfannkuche, G		404,602	Van Dépoele, C. JClark, E. P	June 4 1889
396,580	Loomis, O. P		404,783	Gartner, A	June 4, 1889
396,602	Rice, E. W., jr		404,859	Pfannkuche, G	
396,725	Blades, II. H	Jan. 29, 1889	405,174	Pfannkuehe, G	June 11, 1889
396,867	Grant, P		405,218	Loomis, O. P	
396,932 397,006	Holt, A. J.	Jan. 29, 1889	405,263	Lemp, H	June 18, 1889
397,000	Kester, J. F	Jan. 29, 1889	405,743	Robertson, J. II	June 29, 1889
	171. GENE.	RATION.—97.	Systems (	OF DISTRIBUTION.	
226 706	Rolfold R	Tul- or tone	200 750	Criscom W W	Dec. 4 1000
386,796 386,797	Belfield, RBelfield, R	July 31, 1888	393,756 396,549	Griscom, W. W Dickerson, E. N., jr	Jee. 4, 1888
386,936	Slattery, M. M. M	July 31, 1888	396,582	Loomis O. P.	Jan 22, 1889
387,117	Stanley, W., jr	July 31, 1888	396,603	Loomis, O. P Rice, E. W., jr., and Rohrer,	Jan. 22, 1889
389,795	De Ferranti, S. Z	Sept. 18, 1888	,	A. L.	. ,
390,413	Tesla, N	Oct. 2, 1888	399,218	Stillwell, L. B	Mar. 5, 1889
390,911	Shallenberger, O. B	Oct. 9, 1888	399,219	Stillwell, L. B	Mar. 5, 1889
390,990	Shallenberger, O. B		399,534	Hicks, T. II	Mar. 12, 1889
391,437 391,595	Thomson, E Edison, T. A	Oct. 23, 1888	399,639	Westinghouse, G., jr	Mar. 12, 1889
392,090	Zipernowsky, C., Déri, M., and	Oct. 30, 1888	400,486	Rice, E. W., jr Thomson, E	Apr. 2, 1889
,000	Bláthy, O. T.		400,516	Thomson, E	Apr. 2, 1889
392,114	Fraley, G. B.	Oct. 30, 1888	401,608	Thomson, E	Apr. 16, 1889
392,213	McElroy, W. J	Nov. 6, 1888	402,671	Hicks, T. H	May 7, 1889
392,513	Heisler, C	Nov. 6, 1888	402,971	Ries, E. E.	May 7, 1889
393,073	McElroy, W. J. and McTighe, T. J.	Nov. 20, 1888			
		OTIVE POWE	ER. – 9. C	AR BRAKES.	•
394,627	Widdifield, W. P. and Bowman,	Dec. 18, 1888	398,577	Bowman, A. H. and Widdifield,	Feb. 26. 1889
	A. H.			W. P.	
395,682	Ambler, A. I	Jan. 8, 1889	405,964	Kinsman, F. E.	June 25, 1889
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#### 172. MOTIVE POWER.—75. Locomotion.

172. MOTIVE POWER.—75. LOCOMOTION.						
No.	NAME.	DATE.	No.	NAME.	DATE.	
385,379	Short, S. H	July 3, 1888	396,196	Daft, L	Jan. 15 1889	
385,413	Heysinger, I. W		396,310	Van Depoele, C. J.	Jan. 15, 1889	
385,672	Hunter, R. M.	July 3, 1888	396,311	Van Depoele, C, J.	Jan. 15, 1889	
385,727	Salisbury, W. S	July 10, 1888	396,312	Van Depoele, C. J.		
385,774	Roberts, De W. C.	July 10, 1888	396,313 396,618	Van Depoele, C. J.		
385,787 385,902	Bentley, E. M.		396,633	Short, S. H		
385,903	Bentley, E. M.	July 10, 1888	396,792	Williams, J. T.		
385,915	Daft, L	July 10, 1888	397,451	Van Depoele, C. J.	Feb. 5, 1889	
385,928	Heald, E. W		397,875	Sprague, F. J		
386,085	Ries, E. E.		398,222	Brill, J. A		
386,086 386,087	Ries, E. E		398,402 398,489	Hunter, R. M Brady, T. H.		
386.184	Chesebrough, R. A		398,498	Dahl, O	Feb. 26, 1889	
386,282	Woods, G. T.	July 17, 1888	398,661	Short, S. H	Feb. 26, 1889	
386,543	Jarman, A. J	July 24, 1888	398,662	Short, S. H		
386,581	Enos, J. A		398,663	Short, S. H		
386,784 387,382	Weems, D. G		398,814 398,963	Blake, H. T.——————————————————————————————————	Mar. 5, 1889 Mar. 5, 1889	
387,383	Weems, D. G	Aug. 7, 1888	399,091	Smith, H. W	Mar. 5, 1889	
388,247	Blackwell, J. L	Aug. 21, 1888	399,092	Smith, H. W	Mar. 5, 1889	
388,514	Van Gestel, J. T	Aug. 28, 1888	399,137	Dyer, R. N	Mar. 5, 1889	
388,538	Daft, L	Aug. 28, 1888	399,236	Blair, J. B	Mar. 12, 1889	
388,859 388,955	Green, G. F		399,372 399,409	Bradley, C. S		
389,189	Blackwell, J. L		399,599	Condict, G. H		
389,229	Knight, W. H		399,732	Blake, É	Mar. 19, 1889	
389,230	Knight, W. H	Sept. 11, 1888	399,882	Van Depoele, C. J.	Mar. 19, 1889	
389,254	Shepardson, G. D	Sept. 11, 1888	400,038	Bentley, E. M.		
389,278 389,279	Bentley, E. M.		400,179 400,180	Bentley, E. M.	Mar. 26, 1889	
389,281	Bentley, E. M. Blackwell, J. L.		400,181	Bentley, E. M		
389,282	Blackwell, J. L		400,182	Bentley, E. M.	Mar. 26, 1889	
389,822	Nicholson, J. D., McElroy, W.	Sept. 18, 1888	400,300	Chase, H. A Van Depoelc, C. J	Mar. 26, 1889	
001.004	J. and McTighe, T. J	0 . 10 1000	400,375	Van Depoele, C. J	Mar. 26, 1889	
391,394	Weems, D. G		400,724	Ainslie, D. A	Apr. 2, 1889	
391, <del>44</del> 7 391,792	Wright, P.————————————————————————————————————		400,725	Ainslie, D. A	Apr. 2, 1889 Apr. 2, 1889	
391,793	Heysinger, I. W		400,916	Hunter, R. M.		
392,127	Love, J. C.		400,926	Lundell, R		
392,664	Chase, H. A.		401,221	Short, S. H	Apr. 9, 1889	
392,675 392,757	Hunter, R. M.		401,322 401,515	Wynne, F.	Apr. 9, 1889	
392,772	Allen, O		401,616	Reed, F. H	Apr. 16, 1889	
392,863	Heywood, B		401,796	Short, S. II	Apr. 23, 1889	
392,967	Patten, F. J		401,797	Short, S. H	Apr. 23, 1889	
392,971	Robbins, I	Nov. 13, 1888	401,970	Sandwell, W. D	Apr. 23, 1889	
393,012	Kames, J	Nov. 20, 1888	402,064	Christy, W	Apr. 23, 1889	
393,013 393,224	Field, S. D		402,080 402,084	Hunter, R. M.		
393,275	Van Depoele, C. J.	Nov. 20, 1888	402,117	Van Depoele, C. J.	Apr. 23, 1889	
393,276	Van Depoele, C. J.	Nov. 20, 1888	402,311	De Ferranti, S. Z.	Apr. 30, 1888	
393,277	Van Depoele, C. J.	Nov. 20, 1888	402,832	Hunter, R. M.		
393,278 393,280	Van Depoele, C. J	Nov. 20, 1888	402,836	Jennings, B	May 7, 1889 May 7, 1889	
393,317	Van Depoele, C. J	Nov. 20, 1888	403,009	Van Depoele, C. J		
393,323	Condict, G. H		403,092	Daft, L		
393,572	Paget, L	Nov. 27, 1888	403,192	Hunter, R. M.	May 14, 1889	
393,622	Dallas, M	Nov. 27, 1888	403,193	Hunter, R. M.	May 14, 1889	
393,749 394,015	Fisher, F. ESalisbury, W. S	Dec. 4, 1888 Dec. 4, 1888	403,549 403,754	Orford, J. M.	May 21, 1889	
394,037	Van Depoele, C. J.		403,786	Hunter, R. M.		
394,038	Van Depoele, C. J.		403,800	Van Depoele, C. J.		
394,039	Van Depoele, C. J	Dec. 4, 1888	403,801	Van Depoele, C. J	May 21, 1889	
394,062	Daft, L	Dec. 4, 1888	403,969	Streat, T		
394,139	Short, S. H		404,139	Westinghouse, G., jr.	May 28, 1889	
394,161 394,621	Dulles, W., jr Smith, M. H		404,149 404,325	Ainslie, D. A Van Depoele, C. J	May 28, 1889 May 28, 1889	
394,735	Stevens, W. L.	Dec. 18, 1888	404,441	Shaw, H. F., and G. F		
394,887	Short, S. H	Dec. 18, 1888	404,469	Cannel, W	June 4, 1889	
395,442	Jennings, B	Jan. 1, 1889	404,559	Priest, E. D	June 4, 1889	
395,703 395,761	Jenkins, W. F		404,687	Daft, L	June 4, 1889	
395,961	Trott, S		404,873	Short, S. H		
396,124	Wells, C. H.	Jan. 15, 1889	405,365	Lineff, A. L		
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#### 172. MOTIVE POWER.—75. LOCOMOTION—Continued.

No.	NAME.	DATE.	Ņo.	Name.	DATE.
405,468 405,544 405,556 405,626 405,627	Flad, H Fisher, F. E Hunter, R. M Van Depoele, C. J Van Depoele, C. J	June 18, 1889 June 18, 1889	405,628 405,750 405,767 405,978	Van Depocle, C. J	
	172	. MOTIVE PO	WER.—36	. Motors.	
385,675 387,160 387,714 388,512 388,753 389,197 389,352 389,796 389,876 390,904 390,905 390,921 391,590 391,590 391,593 391,797 392,471 392,471 392,471 392,471 394,525 395,299 395,575 396,121 396,269 396,314	Lugo, O_Guntz, G  Mather, R. H Fiske, B. A Van Gestel, J. T Batley, J Chase, H. A Eastwick, A. E Anthony, W. A Doriot, C Diehl, P Ries, E. E Ries, E. E Van Depoele, C. J Doyle, J Eddy, A. H Hyer, W. E Stanley, W., jr Stanley, W., jr Patten, F. J. and Carnes, J. W Van Depoele, C. J Lugo, O Van Depoele, C. J Sweet, D. F Marvin, H. N Tesla, N Coerper, C Van Depoele, C. J	July 31, 1888 Aug. 7, 1888 Aug. 7, 1888 Aug. 14, 1888 Aug. 28, 1888 Aug. 28, 1888 Sept. 11, 1888 Sept. 11, 1888 Sept. 18, 1888 Oct. 9, 1888 Oct. 9, 1888 Oct. 9, 1888 Oct. 23, 1888 Oct. 23, 1888 Oct. 23, 1888 Oct. 23, 1888 Oct. 30, 1888 Nov. 6, 1888 Nov. 6, 1888 Nov. 6, 1888 Nov. 13, 1888 Dec. 11, 1888 Dec. 4, 1888 Dec. 11, 1888 Dec. 11, 1888 Dec. 11, 1889 Jan. 15, 1889 Jan. 15, 1889 Jan. 15, 1889	396,791 397,439 397,702 397,817 398,457 398,458 399,507 399,507 399,801 399,822 400,311 400,809 400,971 401,231 401,520 402,290 404,465 404,466 404,533 404,651 404,661 405,223 405,668 405,858	Whittingham, G. H Patten, F. J Denison, J. F Patten, F. J Shallenberger, O. B Shallenberger, O. B Patten, F. J Lugo, O Eddy, A. H Thomson, E. and Wightman, M. J. Blades, H. H Davis, E. H. and Westervelt, R Van Depoele, C. J Bain, F Thomson, E Van Depoele, C. J Tesla, N Yeiser, F Silvey, W. L Belding, W. S Belding, W. S Bradley, C. S Bradley, C. S Gartner, A Paca, W. S Slater, H. B Perret, F. A Hunter, R. M Tesla, N	Mar. 26, 1889 Apr. 2, 1889 Apr. 9, 1889 Apr. 9, 1889 Apr. 16, 1889 Apr. 30, 1889 May 7, 1889 May 28, 1889 May 28, 1889 June 4, 1889 June 11, 1889 June 11, 1889
	172. MOTIV	E POWER.—8.	STEERING	G AND PROPULSION.	
388,300	O'Kelly, J	Aug. 21, 1888	388,862	Griswold, H. P.	Sept. 4, 1888
	172. MOTIV	E POWER.—8	3. Transm	ussion of Power.	
404,566 404,567	Shallenberger, O. BShallenberger, O. B	June 4, 1889 June 4, 1889	405,859	Tesla, N	June 25, 1889
	173.	CONDUCTORS	S.—13. Co	NDUCTORS.	
385,576 386,561 388,477 388,487 391,517 391,605 395,546 398,441 398,442	Sibley, C. C.— Sawyer, W. H.— Couner, W. A.— Harris, A. E.— Cuff, J. E.— Hall, E. J.— Conner, W. A.— Patterson, W. R.— Patterson, W. R.—	July 24, 1888 Aug. 28, 1888 Aug. 28, 1888 Oct. 23, 1888 Oct. 23, 1888 Jau. 1, 1889 Feb. 26, 1889	399,826 400,552 401,498 401,936 403,267 404,902 404,913 405,546	Brooks, A. A Doualdson, R. S Johnson, E. H. and Greenfield, E. T Egleston, T Heimann, S Edison, T. A Johns, H. W., jr Trist, R. P	Mar. 19, 1889 Apr. 2, 1889 Apr. 16, 1889 Apr. 23, 1889 May 14, 1889 June 11, 1889 June 18, 1889
	173. CONDU	CTORS 94. C	ONDUCTOR	s—Lead-Covered.	
399,291	Siemens, W				Mar. 12, 1889

#### 173. CONDUCTORS.—70. CONDUCTORS—UNDERGROUND.

No.	NAME.	DATE.	No.	Name.	DATE.
900 119	Phinns F H	Ana 98 1888	400,764	Granna P. P.	Ann 9 1000
388,442 389,943.	Phipps, E. H Silliman, R. F		400,764	Greene, P. R	
391,587	Dallas, M		401,154	Gillette, G. H. and K. C	
393,346	Whelan, J.		401,155	Gillette, G, H. and K. C	
393,823	Flotron, E. and De La Bastie,		401,927	Brooks, D., jr	Apr. 23, 1889
20100	F. B. A. R.	70 44 4000	402,007	Dewees, T. J.	Apr. 23, 1889
394,207	Paige, D. O.	Dec. 11, 1888	402,563	Colgate, A. E	
395,584 396,407	Phipps, E. H Lynch, J	Jan. 1, 1889	402,565 403,352	Cook, G. W Lake, W	
397,221	Callender, W. M	Feb. 5, 1889	403,418	Colgate, A. E	
397,300	Mack, W. B	Feb. 5, 1889	403,825	Cole, C. B	May 21, 1889
399,343	Penney, W. L. and Little, T	Mar. 12, 1889	404,877	Tailleur, G. E	June 11, 1889
400,308	Cranmer, W. C. and Arnold,	Mar. 26, 1889	405,515	Warde, G. H	June 18, 1889
	S. W.		405,576	Lynch, J	June 18, 1889
	173.	CONDUCTORS	S.—14. Co	NNECTORS.	<u> </u>
389,314	McIntire, C.		398,769	Currie, S. C. C	
394,837 394,838	De Ferranti, S. Z De Ferranti, S. Z		399,326 $401,244$	Griggs, A. C Basel, J. C	
396,176	Simpson, D. J		402,829	Hopkins, G. I	
396,543	Cobb, H. B		403,010	Van Depoele, C. J.	May 7, 1889
397,424	Griscom, W. W. and Weidner,	Feb. 5, 1889	403,308	Thompson, E. P	May 14, 1889
207.552	H. N.	T3-1- 10 1000	404,813	Widdicombe, R. H	June 4, 1889
397,553	Johnston, W. C., jr	Feb. 12, 1889		4	
	173.	CONDUCTOR	S.—28. In	SULATORS.	1
386,111	Cutler, H. H	July 17, 1888	398,025	Brown, W. C	Feb. 19, 1889
386,986	Joslin, W. E	July 31, 1888	402,592	Heaviside, A. W	May 7, 1889
390,741	Adams, T. E	Oct. 9, 1888	402,752	Locke, F. M. and Lapp, J.	May 7, 1889
394,380 395,207	Lloyd, E. L Bowen, C. H		403,482	O'Beirne, W. H Smith, T. J	
396,334	Gilson, S. H		403,727	Berrang, J. C	May 21, 1889
396,847	Ashen, P				
	173. C	ONDUCTORS	–31. <b>L</b> ıgн	TNING RODS.	
395,399	Mast, L. L		401,095	Wood, F. E	Apr. 9, 1889
400,464	Lawshe, S. R	Apr. 2, 1089	,		1
	173.	CONDUCTOR	S.—43. R	HEOSTATS.	1
10,944	Weston, E(Reis. of 381,304.)		395,116	Bergmann, S	
10,945	Weston, E (Reis. of 381,305.)	July 17, 1888	398,121	Bergmann, S	Feb. 19, 1889
387,463	Vansant, J. A. and Anderson,	Aug. 7, 1888	$\begin{array}{c} 401,\!405 \\ 402,\!912 \end{array}$	Benardos, N Entriken, J. B	Apr. 16, 1889 May 7, 1889
387,464	Yansant, J. A. and Anderson,	Aug. 7, 1888	402,912	Gish, J. L	
	F. S.	,		· · · · · · · · · · · · · · · · · · ·	
	174. ME	DICAL AND S	URGICA	L.—87. Baths.	
398,327	De Vars, H. A. B. H	Feb. 19, 1889	398,731	James, J. W	Feb. 26, 1889
	174. MEDIO	CAL AND SUI	RGICAL	-88. Body-Wear.	
385,556	Hoke, C. U	July 2 1999	397,790	Fear F	Feb. 12, 1889
388,581	Pratt, H. P		397,806	Fear, F Johnson, W. G	Feb. 12, 1889
389,187	Baldwin, J. W.	Sept. 11, 1888	398,133	De Baun, S	Feb. 19, 1889
389,764	Rutter, N. P.	Sept. 18, 1888	399,954	Warrell, N	Mar. 19, 1889
390,354	Epplé, L	Oct. 2, 1888	401,682	Brust, C	Apr. 16, 1889
391,364 391,720	Granger, E. D Pratt, H. P	Oct. 23 1888	$\begin{array}{c} 401,882 \\ 402,367 \end{array}$	Grimley, C. H Van Dorn, W. L	Apr. 23, 1889 Apr. 30, 1889
393,741	Collins, W. C	Dec. 4, 1888	402,491	Thomas, B. F	Apr. 30, 1889
394,807	Bacon, A. H	Dec. 18, 1888	405,176	Pratt. H. P.	June 11, 1889
394,958	Colling, S	Dec. 25, 1888	405,436	Shelton, W. J.	June 18, 1889
396,212	Long, J. V	Jan. 15, 1889			
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#### 174. MEDICAL AND SURGICAL.—89. ELECTRODES.

No.	NAME.	Date.	No.	NAME.	DATE.				
386,754 390,554	Muir, J. S Woodward, J. H	July 24, 1888 Oct. 2, 1888	397,474 399,084	Stanley, L. TSchmalz, J. B. and Faulkner,	Feb. 5, 1889 Mar. 5, 1889				
	J. B.  175. SPECIAL APPLICATIONS.—4. APPLICATIONS—GENERAL.								
	4		1						
385,927	Hazell, J. W	July 10, 1888	393,192	Thayer, R	Nov. 20, 1888				
10,949	Williams, P. G. and Roovers,	July 24, 1888	393,624	Durieux, C	Nov. 27, 1888				
0000000	A. W. (Reis. of 372,441.)	T 1 01 1000	393,625	Durieux, C					
386,860	Williams, P. G. and Roovers,	July 31, 1888	393,828 394,332	Hall, A. E.	Dec. 4, 1888				
386,919	A. W. Everitt, P	July 31, 1888	397,423	Cadwallader, BGreaves, J	Dec. 11, 1888 Feb. 5, 1889				
389,799	Estabrook, W. W	Sept. 18, 1888	10,986	Belfield, R(Reis. of 392,400.)	Feb. 19, 1889				
390,101	Tweedale, E		399,591	Williams, P. G. and Roovers,	Mar. 12, 1889				
390,113	Bullough, J.	Sept. 25, 1888		A. W.	,				
390,196	Acheson, E. G	Oct. 2, 1888	402,157	Gilman, C. C	Apr. 30, 1889				
392,400	Belfield, R	Nov. 6, 1888	404,600	Caspersson, C. A	June 4, 1889				
393,125	Schulte, W	Nov. 20, 1888	405,124	Schmid, A	June 11, 1889				
		Q		7 36	<u> </u>				
	175. SPECIAL APPLI	CATIONS.—5.	APPLICAT	IONS—TOOLS AND MACHINES.					
389,001	Ongley, C. E	Sept. 4, 1888	403,442	Nickerson, W. E	May 14, 1889				
389,037	Wilkinson, E		403,691	Nickerson, W. E	May 21, 1889				
389,853	Ongley, C. E		404,015	Nickerson, W. E	May 28, 1889				
393,389	Paine, W. J		404,221	Nickerson, W. E	May 28, 1889				
394,952	Baxter, W., jr	Dec. 25, 1888	404,361	McFeely, R. F	May 28, 1889				
395,524	Thayer, R	Jan. 1, 1889	404,667	Woodhouse, D. A. and Forster,	June 4, 1889				
399,341 399,716	McFeely, R. F. and Potter, H. V Whittier, C	Mar. 12, 1889 Mar. 19, 1889	404,893	T. V. Byrne, J. E	June 11, 1889				
403,439	Nickerson, W. E.	May 14, 1889	404,894	Byrne, J. E					
403,440	Nickerson, W. E	May 14, 1889	404,895	Byrne, J. E	June 11, 1889				
403,441	Nickerson, W. E		100,000						
	175. SPECIAI	L APPLICATION	ONS21.	Electro-Magnets.					
389,196	Chase, H. A	Comt 11 1000	401.159	Cooper I	App. 0 1990				
393,337	Lane, F. A	Sept. 11, 1888 Nov. 20, 1888	401,152 403,517	Geary, J Cole, F. W	May 21 1889				
400,795	Root, F. H	Apr. 2, 1889	400,011	0010, 1. 11	1111y 21, 1000				
			i .						
	175. SPE	CIAL APPLIC	ATIONS.	-16. Heaters.					
905 904	Thomas E	T1. 9 1000	900 970	C-#- C I	T 15 1000				
385,384 385,385	Thomson, E		396,270	Coffin, C. L.					
385,386	Thomson, E		396,836 397,857	Shawhan, J. F	Feb. 19 1889				
386,088	Ries, E. E	July 10, 1888	398,912	Thomson, E	Mar. 5, 1889				
386,441	Thomson, E		398,914	Thomson, E					
388,245	Benardos, N.	Aug. 21, 1888	399,019	Coffin, C. L	Mar. 5, 1889				
388,246	Benardos, N.	Aug. 21, 1888	400,978	Watts, H. F	Apr. 9, 1889				
389,729	Wiest, J.		401,482	Dewey, M. W.	Apr. 16, 1889				
390,619	Ries, E. E.	Dec. 18 1888	401,639	Coffin, C. L.	Apr. 16, 1889				
394,892 395,878	Thomson, ECoffin, C. E		402,107	Ries, E. E.					
395,950	Capek, J. V	Jan. 8, 1889	402,108 402,416	Ries, E. E.—————————————————————————————————	Apr. 30 1889				
396,009	Thomson, E	Jan. 8, 1889	403,110	Johnson, G. B. and M	May 14, 1889				
396,010	Thomson, E		403,157	Thomson, E					
396,011	Thomson, E	Jan. 8, 1889	403,374	Ries, E. E	May 14, 1889				
396,012	Thomson, E	Jan. 8, 1889	403,707	Thomson, E	May 21, 1889				
396,013	Thomson, E		403,708	Thomson, E	May 21, 1889				
396,014	Thomson, E	Jan. 8, 1889	404,306	Ries, E. E.					
396,015 396,039	Thomson, E	Jan. 8, 1889 Jan. 8, 1889	405,345	Coffin, C. L.	June 18, 1889				
			277						
	175. SPECIAI	APPLICATIO	NS.—115.	Igniting Devices.					
388,294	McGowen, J. J	Aug. 21, 1888	392,665	Cleverly, H. A	Nov. 13, 1888				
389,151	Hogan, G. L	Sept. 4, 1888	392,701	Thaxter, G. E	Nov. 13, 1888				
389,421	Tag, W. and Smith, S. C	Sept. 11, 1888	393,304	Haskins, C. H	Nov. 20, 1888				
389,692	Downs, H. T	Sept. 18, 1888	393,525	Shaw, N. H	Nov. 27, 1888				
392,440	Lehman, J. H	Nov. 6, 1888	405,126	Shaw, N. H.	June 11, 1889				
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#### 175. SPECIAL APPLICATIONS.—115. IGNITING DEVICES—AUTOMATIC.

	110. STECIAE ATT	DICITE OTIO.	ito. Idnii.	ING DEVICES ACTOMATIC.	
No.	NAME.	DATE.	No.	Name.	DATE.
398,805 401,153	Steinhilber, A		403,944	Lehman, J. H	May 28, 1889
	175. SPECIAL AP	PLICATIONS.	-116. Ignī	TING DEVICES—MANUAL.	
399,168 399,416 400,479	Tag, W. and Smith, S. C. Kronenberg, E. Parke, J. G.	Mar. 12, 1889	400,492 402,332	Rousseau, D Knowlton, D. C	
	175. SPECI	AL APPLICAT	TONS.—1	17. Incrustation.	
387,145 387,146 388,592	Clamer, F. J Clamer, F. J Siebel, J. E	July 31, 1888	392,736 393,072	Kotyra, M Marquand, A. J	Nov. 13, 1888 Nov. 20, 1888
	175. SPECIAL AP	PLICATIONS	-93. Mag	NETIC LOCKS AND BOLTS.	
386,066 390,795 393,282	Gridley, F. J Neu, G. S Wildt, E. A	Oct. 9, 1888	393,711 396,723	Lüngen, A	Nov. 27, 1888 Jan. 29, 1889
	175. SPEC	TAL APPLICA	TIONS.—	90. Separators.	
390,7229 393,348 396,356 399,375 400,317 400,747 400,747 401,414 401,415 401,688 402,684	Hempel, A.— Atkins, C. H.— Edison, T. A. Burden, J. A Edison, T. A.— Conkling, G— Conkling, G— Conkling, G— Conkling, G— Conkling, G— Conkling, G— Coats, C. C— Maxim, H. S	Nov. 27, 1888 Jan. 15, 1889 Mar. 12, 1889 Mar. 26, 1889 Apr. 2, 1889 Apr. 2, 1889 Apr. 16, 1889 Apr. 16, 1889 Apr. 16, 1889 May 7, 1889	402,904 403,250 403,256 403,575 403,576 403,624 404,332 404,333 404,334 405,045	Conkling, G Cheever, J. D Eames, H. II Conkling, G Conkling, G Thomas, W. R. Ball, C. M. and Norton, S Ball, C. M. and Norton, S Ball, C. M. aud Norton, S Mowrer, M. L.	May 14, 1889 May 14, 1889 May 21, 1889 May 21, 1889 May 21, 1889 May 28, 1889 May 28, 1889 May 28, 1889
	175. SPECIAL	APPLICATIO	NS.—84.	VALVE CONTROLLERS.	i
386,463 389,097 392,679 393,396 397,260	Grah, E. A. Newman, E. A. Lee, G. M. Scribner, C. E. Weslens, R.	Sept. 4, 1888 Nov. 13, 1888 Nov. 27, 1888	398,314 401,582 401,801 402,779 405,010	Currier, H. L	Apr. 16, 1889 Apr. 23, 1889 May 7, 1889
	176. ELECTRIC	LIGHTING,—80	O. Cut-Ou	TS—ELECTRO-MAGNETIC.	
385,494 391,853 392,724 394,485 395,533	Wright, C. D	Oct. 30, 1888 Nov. 13, 1888 Dec. 11, 1888	396,439 396,940 399,400 403,941	Sperry, E. A.——————————————————————————————————	Jan. 29, 1889 Mar. 12, 1889
	- 176. ELECTR	IC LIGHTING.	—79. Cut	OUTS—MECHANICAL.	
355,539 385,782 385,815 385,826 387,732 390,481 391,351 391,512 391,943 392,633 393,365 393,590	Bergman, E. F- Wheeler, S. S- Mayo, J. E- Sechrist, A - McElroy, J. F- Powers, J. A- Johnson, W. A - Adams, J. S- Cleveland, W. B- Bryant, W. C- Johnson, O. B- Perkins, C. G- Griscom, W. W Smith, D. W-	July 10, 1888 July 10, 1888 July 10, 1888 Aug. 7, 1888 Oct. 2, 1888 Oct. 16, 1888 Oct. 23, 1888 Oct. 30, 1888 Oct. 30, 1888 Nov. 13, 1888	394,180 394,568 395,669 396,632 396,880 397,109 397,715 397,729 397,826 398,288 398,510 398,560 398,560 398,561	Heisler, C. Griscom, W. W. Brangs, P. H. Waters, B. E. Knowles, E. R. Bussmann, O. S. Hammer, W. J. Knowles, E. R. Andrews, A. E. Stirling, C. C. Hill, W. S. Weller, F. A. and Rietzel, A. F. Weller, F. A. and Rietzel, A. F. Dillon, L. W.	Dec. 18, 1888 Jan. 1, 1889 Jan. 22, 1889 Jan. 29, 1889 Feb. 5, 1889 Feb. 12, 1889 Feb. 12, 1889 Feb. 12, 1889 Feb. 19, 1889 Feb. 26, 1889 Feb. 26, 1889 Feb. 26, 1889

#### 176. ELECTRIC LIGHTING.—79. Cut-Outs—Mechanical—Continued.

No.	Name.	Date.	No.	NAME.	DATE.		
399,135 399,550 400,732 400,733	Dillon, L. W	Mar. 12, 1889 Apr. 2, 1889	400,808 401,270 405,248	Turner, J. A	Apr. 2, 1889 Apr. 9, 1889 June 18, 1889		
	· 176. ELECTE	RIC LIGHTING	й.—78. Си	T-OUTS—THERMAL.			
385,770 386,099 391,594 393,473 395,421 396,579 396,920	Mingle; G. W. and M	July 10, 1888 Oct. 23, 1888 Nov. 27, 1888 Jan. 1, 1889 Jan. 22, 1889	398,566 399,305 400,669 401,527 402,249 402,753 402,754	Wright, W. H. S	Feb. 26, 1889 Mar. 12, 1889 Apr. 2, 1889 Apr. 16, 1889 Apr. 30, 1889 May 7, 1889 May 7, 1889		
	176. ELECTRIC LIGI	HTING.—105. I	лентя—А	RC, GRAVITY FEED, CLUTCH.			
390,245 391,761 392,393 393,405 393,574	Mather, R. H	Oct. 23, 1888 Nov. 6, 1888 Nov. 27, 1888	400,352 404,351 11,002 405,440	Miller, W. H Fox, J. R Noble, C. B(Reis. of 374,129.) Sperry, E. A	Mar. 26, 1889 May 28, 1889 May 7, 1889 June 18, 1889		
	176. ELECTRIC LIGHTI	NG.—106. LIGH	нтя—А RC,	GRAVITY FEED, GEAR-CLUTCH.			
388,053 393,447 398,906 398,907	Killin, V. C Pfannkuche, G Silvey, W. L Silvey, W. L	Nov. 27, 1888 Mar. 5, 1889	399,054 400,476 400,692	Lane, G. M Nutting, S. E Lane, G. M	Apr. 2, 1889		
-	176. ELECTRIC	LIGHTING.—1	07. LIGHT	s—Arc, Positive Feed.			
385,705 391,477	Gaston, J. ELibbey, H. W	July 10, 1888 Oct. 23, 1888	403,964	Silvey, W. L.	May 28, 1889		
	176. ELECTRIC LIGHT	ING.—109. Lig	нтз—Акс	, Positive Feed, Gear-Clutch.			
388,594 388,697 394,791 400,198	Spencer, L. W. and Jaquith, F. P Lea, J Schefbauer, R Edwards, E. A	Aug. 28, 1888 Aug. 28, 1888 Dec. 18, 1888 Mar. 26, 1889	403,671 404,244 404,245 405,906	Houghton, D Atwood, La M. C Atwood, La M. C Pieper, H., fils	May 28, 1889		
	176. ELECTRIC LI	GHTING.—112	. Lights-	-Arc, Special Features.			
388,723 395,755	Schardt, B. and Jones, GPawlowski, J		398,870 399,786	Wood, J. J Schardt, B. and Jones, G	Mar. 5, 1889 Mar. 19, 1889		
176. ELECTRIC LIGHTING.—102: LIGHTS—FILAMENTS AND CARBONS.							
388,757 390,310 390,462 391,815 391,816 392,159 392,520 393,391 395,963 397,754	Burns, J Packard, J. W Edison, T. A Packard, J. W Packard, J. W Lemp, H McTighe, J. J Ram, G. S Edison, T. A Rheiner, H. S	Oct. 2, 1888 Oct. 2, 1888 Oct. 30, 1888 Oct. 30, 1888 Oct. 30, 1888 Oct. 30, 1888 Nov. 6, 1888 Nov. 27, 1888 Jan. 8, 1889	401,120 401,606 401,607 404,112 404,118 404,463 405,170 405,239 405,480	Bottome, T. D Thompson, E. P Thompson, E. P Reinmann, A. L. and Lange, P. Smith, F. S Bottome, T. D Maxim, H. S Hughes, T. V. and Chambers, C. R.	Apr. 16, 1889 Apr. 16, 1889 May 28, 1889 May 28, 1889 June 4, 1889 June 11, 1889		

#### 176. ELECTRIC LIGHTING.—18. LIGHTS—INCANDESCENT.

No.	NAME.	DATE.	No.	NAME.	DATE.
389,369 390,903 391,596 392,158 395,962 397,479	Edison, T. A.——————————————————————————————————	Oct. 9, 1888 Oct. 23, 1888 Oct. 30, 1888 Jan. 8, 1889	398,774 400,378 401,444 401,646 404,816	Edison, T. A	Feb. 26, 1889 Mar. 26, 1889 Apr. 16, 1889 Apr. 16, 1889 June 11, 1889
	176. ELECTRIC LIGHT	[NG.—113. Ligi	HTS-INCA	NDESCENT—SPECIAL FEATURES.	
397,218 399,497 400,473 400,600	Bergmann, S	Mar. 12, 1889 Apr. 2, 1889	401,417 402,420 405,742 405,970	Cox, C. W. and Van Dyke, T. E Doubleday, H. M. and R.——— Orford, J. M.——————————————————————————————————	Apr. 30, 1889 June 25, 1889
	176. ELECTRIC	LIGHTING.—	98. Ligut	s—Sockets and Keys.	
385,436 389,280 389,888 392,666 393,733	Adams, J. S. and Morrell, A. W Bergmann, S	Sept. 11, 1888 Sept. 25, 1888 Nov. 13, 1888	396,583 399,748 402,481 403,397	Loomis, O. P	Jan. 22, 1889 Mar. 19, 1889 Apr. 30, 1889 May 14, 1889
	176. ELECT	RIC LIGHTIN	G.—19. L	IGHTING—SYSTEMS.	
386,956 387,615 387,932 389,297 389,758 391,923 395,215 395,936	Belfield, R Brown, H. P Thompson, W. H Griscom, W. W Morrell, A. W Slattery, M. M. M Davies, D. H. and Tourtel, J. M Wightman, M. J	Aug. 7, 1888 Aug. 14, 1888 Sept. 11, 1888 Sept. 18, 1888 Oct. 30, 1888 Dec. 25, 1888	396,241 397,906 400,214 401,486 405,572 405,895 405,896	Shawhan, J. F	Jan. 15, 1889 Feb. 19, 1889 Mar. 26, 1889 Apr. 16, 1889 June 18, 1889 June 25, 1889 June 25, 1889
	177. E	LECTRIC SIGN	NALING.	-1. Alarms.	
394,491 395,096 397,657 398,069	Johns, J. H	Dec. 25, 1888 Feb. 12, 1889	400,028 401,521	Woodring, W. H. and Gilbert, C. S. Walsh, E., jr	Mar. 19, 1889 Apr. 16, 1889
	177. ELECT	RIC SIGNALI	NG.—2. A	LARMS—BURGLAR.	
388,438 389,272 393,657 396,667 396,701	Nutter, F. H	Sept. 11, 1888 Nov. 27, 1888 Jan. 22, 1889	398,144 398,420 400,239 401,789	Geary, J McCarthy, I., A McKinney, J. Y Nutter, F. H	Feb. 19, 1889 Feb. 26, 1889 Mar. 26, 1889 Apr. 23, 1889
	177. ELEC	CTRIC SIGNAL	ING.—3.	Annunciators.	
385,357 385,894 386,597 388,344 388,837 388,876 390,833 391,276 392,766 392,970 393,078	Kelly, J. E Wood, M. M McLaughlin, J. F Dey, C. E Crockett, C. H. and Allen, C. C. Humans, W Barrett, A. and Zentner, J Sax, J Trafford, W Ritchie, F Rossbach, W. F	July 10, 1888 July 24, 1888 Aug, 21, 1888 Sept. 4, 1888 Sept. 4, 1888 Oct. 9, 1888 Oct. 16, 1888 Nov. 13, 1888	394,081 394,555 396,795 397,364 400,050 400,304 400,750 400,951 400,985 402,043 402,626	Patten, F. J. and Bingham, T. A Clark, W. C	Dec. 18, 1888 Jan. 29, 1889 Feb. 5, 1889 Mar. 26, 1889 Mar. 26, 1889 Apr. 2, 1889 Apr. 9, 1889 Apr. 9, 1889 Apr. 23, 1889

#### 177. ELECTRIC SIGNALING.—7. BELLS.

	un-					
No.	Name.	DATE.	No.	NAME.	DATE.	
388,836	Crane, M. G	Sept. 4, 1888	393,998	McLaughlin, J. F	Dec. 4, 1888	
389,080	Humans, W		401,296	Noyes, J. G.	Apr. 9, 1889	
389,423	Tirrell, J. P.	Sept. 11, 1888	402,165	Kinsey, I		
391,547	Milliken, G. F		402,613	Rainey, W. K	May 7, 1889	
393,710	Lüngreu, A	Nov. 27, 1888	402,960	Moffatt, R. R	May 7, 1889	
	177. ELI	ECTRIC SIGNA	LING.—	26. Indicators.		
386,189	Delany, P. B.	July 17, 1888	395,783	Hollerith, H	Jan. 8, 1889	
388,690	Kirwan, G. H.	Aug. 28, 1888	395,862	Winslow, G. E	Jan. 8, 1889	
391,568	Waters, B. E	Oct. 23, 1888	398,713	Enos, J. A	Feb. 26, 1889	
394,520	Thornycroft, J. I	Dec. 11, 1888	399,163	Ricketson, J. C.	Mar. 5, 1889	
395,781 395,782	Hollerith, HHollerith, H	Jan. 8, 1889 Jan. 8, 1889	404,866 $404,867$	Ricketson, J. C.	June 11, 1889 June 11, 1889	
		0, 2000	101,007	111011011011011	5 directi, 1000	
	177. ELECT	RIC SIGNALI	NG.—38.	RAILWAY-SIGNALS.		
385,363	Martel, A. F	July 3, 1888	397,270	Boda, A. Z	Feb. 5, 1889	
385,677	Martel, A. F	July 3, 1888	398,613	Hayden, H., jr. aud Desant, W.	Feb. 26, 1889	
385,920	De Redon, C. F		000 155	F. Z.	35 5 7000	
385,964	Sharp, E. A		399,155	Palmer, H. J. Hull, W. S. and Anderson, J. C.	Mar. 5, 1889	
386,049 387,316	Wright, G. H		399,331 399,474	Benjamin, F. P	Mar. 12, 1889 Mar. 12, 1889	
387,365	Oreutt, E. L		399,556	Putnam, T. A. B	Mar. 12, 1889	
389,122	Turner, W. A		399,579	Stitzel, F. and Weinedel, C	Mar. 12, 1889	
389,226	Irwin, J		400,525	Waddell, W. H	Apr. 2, 1889	
392,443	Long, M. W		400,880	Street, S. T	Apr. 2, 1889	
392,444 393,431	Long, M. W.		401,472 401,591	Taylor, T	Apr. 16, 1889 Apr. 16, 1889	
393,865	Stitzel, F. and Weinedel, C		401,664	Steenbergh, G. C	Apr. 16, 1889	
395,163	Meloon, I. L. and Whiting, P. S.	Dec. 25, 1888	402,506	Carter, J. T	Apr. 30, 1889	
395,315	Coleman, J. P		402,562	Coleman, J. P	May 7, 1889	
395,667	Smith, D. G		403,180	De Mier, J. R.	May 14, 1889	
396,207 396,365	Henion, W.————————————————————————————————————	Jan. 15, 1889 Jan. 15, 1889	403,515	Casey, T. A.——————————————————————————————————	May 21, 1889 May 21, 1889	
000,000	O. D.	ban: 10, 1000	404,170	Coleman, J. P	May 28, 1889	
396,748	Kookogey, W. P		404,457	Wisner, A. J	June 4, 1889	
396,749	Kookogey, W. P		405,519	Wuerpel, M	June 18, 1889	
396,750	Kookogey, W. P	Jan. 29, 1889	405,815	White, J. C.	June 25, 1889	
	177. ELI	ECTRIC SIGNA	LING.—8	39. Recorders.		
389,273	Weston, E	Sept. 11, 1888	402,120	Wilson, J. C.	Ann 99 1990	
392,838	Wilson, J. C	Nov. 13, 1888	402,120	Holcomb, F. A	Apr. 23, 1889 May 7, 1889	
		,		, and the second second		
***************************************	178.	TELEGRAPH	Y.—46. A	UTOMATIC.		
386,059	Cuttriss, C	July 10, 1888	399,154	O'Neil, J	Mar. 5, 1889	
386,814	Gray, É	July 31, 1888	402,414	Dewey, M. W.	Apr. 30, 1889	
386,815	Grav, E	July 31, 1888	402,415	Dewey, M. W	Apr. 30, 1889	
389,883 394,960	Field, S. D. Dewey, M. W.	Sept. 25, 1888	405,539	Dewey, M. W.	June 18, 1889 June 25, 1889	
395,427	Delany, P. B.		405,984	Burke, C. G	June 25, 1889	
397,977	Dressler, C. E		100,000	Burne, o. a	0 and 20, 1000	
	178. T	ELEGRAPHY	-10. Circ	cuit-Closers.		
390,329	Willatowsky, A. F. L	Oct. 2, 1888	399,057	Lecoultre, I. E	Mar. 5, 1889	
390,778	Harris, P. A	Oct. 9, 1888	400,232	Lehman, J. H	Mar. 26, 1889	
391,855	Ongley, C. E	Oct. 30, 1888	400,235	Liebert, E. and Rosenthal, S. A-		
391,917	Randall, J. D		401,035	Kaselowsky, E		
393,558 394,164	Harms, C. F		402,828	Hopkins, G. I	May 7, 1889 May 28, 1889	
394,925	Hoyt, A. J	Dec. 18, 1888	405,525	Braun, C. A	June 18, 1889	
397,838	Denio, W. L	Feb. 12, 1889				
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#### CLASSIFIED INDEX—ELECTRICITY.

#### 178. TELEGRAPHY.—45. CIRCUITS AND SYSTEMS.

	-				
No.	NAME.	~ Date.	No.	NAME.	DATE.
388,008 388,481 389,062 390,802 394,961 398,035	Ader, C Delany, P. B Delany, P. B Patten, F. J Dewey, M. W Dieuleveult, U	Aug. 28, 1888 Sept. 4, 1888 Oct. 9, 1888 Dec. 25, 1888	399,314 401,334 402,298 403,292 404,165 405,985	Burnley, W	Apr. 30, 1889 May 14, 1889 May 28, 1889
	178.	TELEGRAPH	Y.—12. Co	ONDENSERS.	-
400,866	Marshall, W	Apr. 2, 1889	402,027	Marshall, W	Apr. 23, 1889
	. 178	. TELEGRAPI	HY.—49.	DYNAMO.	***************************************
398,614	Healy, C. L				Feb. 26, 1889
	178. TELEGRAF	PHY.—103. First	E-ALARN	is and Extinguishers.	
387,265 388,357 394,839 395,111	Stuckert, J. F	Aug. 21, 1888 Dec. 18, 1888	395,112 396,385 397,171 399,738	Barnes, W. A	Jan. 22, 1889 Feb. 5, 1889
	1	78. TELEGRA	PHY.—50	. Fire.	
385,388 386,175 386,772 387,585 388,358 388,631 389,678 392,604 392,604 392,641 392,632 394,784 395,101	Thompson, W. C. Wilson, J. C. Davis, E. Dudley, W. J. Gnest, J. H. Chase, S. A. Turner, T. G. Dubinski, B. Hale, G. C., Barrett, A. and Zentner, J. Slocum, E. L Talbot, C. N. Milliken, G. F. Wilson, J. C. Wilson, J. C.	July 17, 1888 July 24, 1888 Aug. 7, 1888 Aug. 21, 1888 Aug. 28, 1888 Sept. 18, 1888 Nov. 13, 1888 Nov. 13, 1888 Nov. 13, 1888 Dec. 18, 1888 Dec. 25, 1888	395,958 395,959 396,450 397,194 400,264 402,507 402,642 402,986 404,236 404,438 404,518 404,519 405,235 405,831	Dewey, M. W Dewey, M. W Zoeller, T. J Martin, M Sperry, E. A Chase, S. A Young, J Shafer, E. B Robbins, A. C Ruddick, J. J Chase, S. A Wilson, J. C Dewey, M. W	Jan. 8, 1889 Jan. 8, 1889 Jan. 22, 1889 Feb. 5, 1889 Mar. 26, 1889 Apr. 30, 1889 May 7, 1889 May 7, 1889 May 28, 1889 June 4, 1889 June 4, 1889 June 4, 1889 June 11, 1889 June 25, 1889
	178. TELI	EGRAPHY.—3(	). Lightn	ING ARRESTERS.	
387,051 397,418 400,463	Cheney, F. A Crandall, J. E Law, M. D		401,085 404,154	Thomson, E Belfield, R	Apr. 9, 1889 May 28, 1889
	1	78. TELEGRA	PHY.—29	. Keys.	
386,729 390,642	Townsend, L. and Auten, J. E. Bennett, J. B.	July 24, 1888 Oct. 9, 1888	405,621	Taylor, C. W	June 18, 1889
	. 178.	TELEGRAPH	Y.—51. M	ULTIPLEX.	
392,914 395,508 395,509.	Field, S. D Patten, F. J Patten, F. J		395,510 395,556 396,734	Patten, F. J	Jan. 1, 1889

#### 178. TELEGRAPHY.—54. PRINTING.

No.	NAME.	DATE.	No.	NAME.	DATE.
385,565 386,646 388,140 388,141 388,142 388,143 388,244 389,142	McLaughlin, J. F  Saudoi, J. M. E  Fiske, B. A	July 24, 1888 Aug. 21, 1888 Aug. 21, 1888 Aug. 21, 1888 Aug. 21, 1888 Aug. 21, 1888	394,302 395,614 397,466 398,833 402,099 403,472 404,426	Sheffield, G. V. Dewey, M. W. McCoy, A. T. Higgins, F. H. W. Munier, C. J. A. Hotchkiss, Z. P. Oehmen, G. T.	Jan. 1, 1889 Feb. 5, 1889 Mar. 5, 1889 Apr. 23, 1889 May 14, 1889
	178.	relegraphy	T.—55. Qt	JADRUPLEX.	
405,211	Haskins, C. D.				June 11, 1889
	178. 7	TELEGRAPHY	7.—56. RA	ILWAY-CAR.	
386,541 388,803 388,869 396,983	Ives, E. B	Aug. 28, 1888 Sept. 4, 1888	397,049 399,228 402,408	Cade, B Hopkins, G. I Crouch, F. J	Mar. 5, 1889
	17	78. TELEGRAI	PHY63	. Reed.	
388,091 388,092 388,333	Van Rysselberghe, F Van Rysselberghe, F Barnard, W. T		395,613 400,523 403,258	Dowey, M. W	Apr. 2, 1889
	178. TELE	EGRAPHY.—41	l. Relays	AND Sounders.	
389,337 394,697 396,465 402,639 402,717	Stitzel, F. and Weinedel, C Jamieson, P. F	Dec. 18, 1888 Jan. 22, 1889 May 7, 1889	403,626 405,987 405,988 405,989	Van Epps, F. L Burke, C. G Burke, C. G Burke, C. G	June 25, 1889 June 25, 1889
	178. T	ELEGRAPHY	.—69. Tr	ANSMITTERS.	
386,129 400,141	Hotchkiss, Z. PStoue, R. C	July 17, 1888 Mar. 26, 1889	402,929 404,507	Holcomb, F. A.Shafer, E. B.	May 7, 1889 June 4, 1889
	· 179. TELE	CPHONY.—82.	Anti-Indi	uction Devices.	
393,165 397,331	Lockwood, T. D Barrett, J. A	Nov. 20, 1888 Feb. 5, 1889	399,377 402,810	Carty, J. J Denver, W. J	Mar. 12, 1889 May 7, 1889
	179. TELEPI	HONY.—81. Co	NDUCTORS	-Anti-Inductive.	
392,103 392,775	Campbell, H. FBarrett, J. A	Oct. 30, 1888 Nov. 13, 1888	403,262	Garland, E. F	May 14, 1889
	179. TEI	LEPHONY.—57	. Teleph	ones—Calls.	
390,058 391,839 394,946 397,176 397,284	Bernheim, E. I Davis, E Wood, J. B Ferdinand, A. B Griffith, A. and Burbank, H. A	Oct. 30, 1888 Dec. 18, 1888 Feb. 5, 1889	399,505 400,326 403,104 403,776 405,420	Dudley, W. J	Mar. 26, 1889 May 14, 1889 May 21, 1889

#### 179. TELEPHONY.—58. TELEPHONES—DETAILS.

	179. TEI	LEPHONY.—58	· IELEPHO	ONES—DETAILS.	
No.	NAME.	DATE.	No.	NAME.	DATE.
401,732	Candee, W. L.	Apr. 23, 1889	404,471	Drake, E. S.	June 4, 1889
	179. TEL	EPHONY.—59.	ТЕГЕРНО	NES—ELECTRIC.	
385,664 385,956 386,380 386,965 388,242 390,575	Emmner, J., jr————————————————————————————————————	July 17, 1888 July 31, 1888 Aug. 21, 1888	391,356 395,476 399,666 400,591 401,743	Collins, W. H.——————————————————————————————————	Jan. 1, 1889 Mar. 19, 1889 Apr. 2, 1889
	179. TELI	EPĤONY.—60.	Тегерно	NES-MAGNETIC.	
400,325	Ginochio, N. B.				Mar. 26, 1889
	179. TEL1	EPHONY.—77.	Relâys .	and Repeaters.	
390,428	Wright, P				Oct. 2, 1888
	179. TELI	EPHONY.—100.	TELEPH	ONES-SUPPORTS.	
387,718 392,843 400,520 400,911	Hartwell, N. W Bergmann, S Tuttle, C. R Hall, P E	Nov. 13, 1888 Apr. 2, 1889	403,316 404,680 405,566 405,677	Adams, S. J Brown, C. W Konigslow, O Pickernell, F. A.	May 14, 1889 June 4, 1889 June 18, 1889 June 18, 1889
	179. TELEP	HONY.—85. Tr	ELEPHONE	s—Switch-Boards.	
385.846 393,824 394,964	Cook, J. A	Dec. 4, 1888	399,269 401,067	Kelly, J. W Reilly, J. C	Mar. 12, 1889 Apr. 9, 1889
	179. TEL	EPHONY.—71.	Тегерио	nes—Switches.	<i>(</i>
394,173 402,121	Griffith, A. and Burbank, H. A. Woelk, E. A.		405,382	Stromberg, A	June 18, 1889
	179. TEI	EPHONY.—64.	Теперно	ONES—SYSTEMS.	
385,482 385,528 385,528 385,974 385,976 385,976 385,978 386,886 386,887 387,645 387,889 387,889 387,889 388,453 388,454 388,454 388,454 388,922 391,762 392,033 392,248 392,301	Scribner, C. E. Scribner, C. E. Kellogg, M. G. Vail, T. N. Kellogg, M. G. Scribner, C. E. Jacques, W. W. Wilson, J. C. Bailey, R. M.	July 3, 1888 July 10, 1888 July 31, 1888 July 31, 1888 Aug. 14, 1888 Aug. 14, 1888 Aug. 21, 1888 Aug. 21, 1888 Aug. 22, 1888 Aug. 28, 1888 Aug. 28, 1888 Cot. 23, 1888 Oct. 30, 1888 Nov. 6, 1888	392,326 392,403 393,508 393,508 393,529 393,612 394,195 394,230 394,832 394,832 394,914 394,951 395,137 10,989 400,969 402,264 403,291 403,458 403,458 405,461 405,867	Gould, C. C.—Blake, F.—Ker, J. B. and Crawford, J.—Kellogg, M. G.—Kellogg, M. G.—Vansize, W. B.—Brown, C. W.—Maxwell, G. S.—Vail, T. N. and Seely, J. A.—Casey, J. F.—Casey, J. F.—Durant, G. F. and Bailey, H. L.—Balsley, U. H.—Hayes, H. V.—Vansize, W. B.—(Reis. of 393,529) Thayer, H. B.—McCluer, C. E.—Robertson, J. H.—Carty, J. J.—O'Connell, J. J.—McKivitt, W. E.—Burbank, H. L.—Beach, F. G.—	Nov. 6, 1888 Nov. 20, 1888 Nov. 27, 1888 Nov. 27, 1888 Nov. 27, 1888 Nov. 27, 1888 Dec. 11, 1888 Dec. 18, 1888 Dec. 18, 1888 Dec. 18, 1888 Dec. 25, 1888 Dec. 25, 1888 Mar. 5, 1889 Apr. 9, 1889 Apr. 90, 1889 May 14, 1889 May 14, 1889 June 11, 1889

#### 1. AERATION AND BOTTLING.—10. SODA-WATER APPARATUS.

No.	NAME.	DATE.	No.	Name.	DATE.
394,834	Cleeve, H. F. and Parker, J				Dec. 18, 1888
		2. APPAREL	.—4. Cut	TING.	ž.
391,285	Warth, A			50 To Table	Oct. 16, 1888
	9.	BOATS.—3. B	UOYS AND	SAFES	
395,187	Smith, W. B				Dec. 25, 1888
	14. BI	RIDGES.—3. G	IRDERS AN	VD COLUMNS.	
£93 <b>,</b> 040	Thomson, E	Nov. 20, 1888	404,232	Snead, U	May 28, 1889
		14. BRIDGES	.—10. Tov	VERS.	-
390,001	Brown, L. W				Sept. 25, 1888
	16. BU	ULDERS' HAF	RDWARE	.—20. Bolts.	
388,229	Thode, C. W. F				Aug. 21, 1888
	21. CAR.	RIAGES AND	WAGOX	S.—65. Trucks.	
402,890	Bemis, S. A. and Pfingst, L			8	May 7, 1889
	18. CAOUTCHO	UC AND MIN	OR PLAS	STICS.—3. CELLULOID.	
393,751	France, J. R.	Dec. 4, 1888	393,752	France, J. R.	Dec. 4, 1888
	18. CAOUTCHOUC AND	MINOR PLAS	STICS.—7	. Miscellaneous Compositions	j.
393,838	Kiel, W	Dec. 4, 1888	335,083	Siemens, W	Dec. 25, 1888
	18. CAOUTCHOUC AN	ND MINOR PL	ASTICS	-11. Insulating Materials.	
386,925 393,029	Lee, C. T	July 31, 1888 Nov. 20, 1888	393,644 401,014	Hermann, S De Figanière, A	Nov. 27, 1888 Apr. 9, 1889
	23.	CHEMICALS	—10. Мет	ALLOIDS.	
397,992	Merkel, G. H				Feb. 19, 1889
	2	3. CHEMICAL	S.—13. SA	LINES.	
393,578	Paget, L				Nov. 27, 1888
	23. CH	IEMICALS.—26	. Purify	ING WATER.	
386,073	Jewell, O. H	July 10, 1888	387,467	Webster, W., jr	Aug. 7, 1888

#### 23. CHEMICALS.—27. Electrolysis.

No.	NAME.	DATE.	No.	NAME.	DATE.
397,407	Webster, W., jr	Feb. 5, 1889	398,101	Webster, W., jr	Feb. 19, 1889
		28. CORDAGE	.—14. WA	RPING.	
395,851	Schwartz, L. H. A.				Jan. 8, 1889
	28. CORDA	GE.—16. WIND	ING BOBB	INS-WEFT-WIND.	
393,887	Couche, J				Dec. 4, 1888
	32.	DENTISTRY	-5. Misce	LLANEOUS.	•
404,745	Taylor, E. C				June 4, 1889
	39.	FENCES.—12.	WIRE-FA	STENERS.	
401,343	Gildemeyer, C. A				Apr. 16, 1889
	39. FEN	CES.—38. RAII	WAY GAT	es-Electric.	
397,880	Toulmin, M			·	Feb. 12, 1889
	40. ADV	VERTISING.—	2. Аптом.	ATIC DEVICES.	
395,151	Laurence, A	Dec. 25, 1888	398,276	Pierce, A. M	Feb. 19, 1889
	40. ADVE	RTISING.—12.	Show-Bo	XES AND CARDS.	
393,402	Smith, A. C	· 			Nov. 27, 1888
	4	0. ADVERTIS	ING.—14.	Signs.	. •
395,317	Dubey, E. A.	Jan. 1, 1889	402,683	Manning, C. E	May 7, 1889
	41. FINE	E ARTS.—17. T	HEATRICA	L APPLIANCES.	and the same of th
397,678	Wilson, F				Feb. 12, 1889
	46. GAM	ES AND TOYS	5.—20. GA	ME APPARATUS.	
400,011	Rogers, T. B. and Bartlett, S. H				Mar. 19, 1889
	57. HOIS	FING.—22. CAI	PSTANS AN	D WINDLASSES.	
403,164	Wiest, J	THE REPORT OF PARTY THE			May 14, 1889
		58. HOROLOG	Y.—3. CL	ocks.	
404,906	Hadlock, W. E	9			June 11, 1889

#### 58. HOROLOGY.—15. Time Alarms.

		HOROLOGI.=			
No.	NAME.	DATE.	No.	NAME.	DATE.
398,896 403,100	Kahan, S. and Craven, A. W Grady, T. H	Mar. 5, 1889 May 14, 1889	405,206	Dubinski, B	June 11, 1889
	58. II	OROLOGY.—1	6. TIME (	Checks.	
386,767 389,626	Bulen, G. F	July 24, 1888 Sept. 18, 1888	394,049 400,283	Bassford, W. K. and Maynard, E. B. Adams, H. R	Dee. 4, 1888 Mar. 26, 1889
	58.	HOROLOGY.	-20. WAT	CH CASES.	
403,211	Pratt, H. P				May 14, 1889
	58. H	OROLOGY.—28	8. Clocks	-Electric.	
386,103 387,276 387,703 387,704 387,974 388,622 390,230 391,446 391,969 392,230	Bohmeyer, C Wieseman, A. G Warner, C. D Warner, C. J Hexamer, C. J Brainerd, F. W Hoefling, C. E Wiseman, A. G Himmer, V Scales, W. S	Aug. 7, 1888 Aug. 14, 1888 Aug. 14, 1888 Aug. 14, 1888 Aug. 28, 1888 Oct. 2, 1888 Oct. 23, 1888 Oct. 30, 1888	393,159 393,637 395,357 399,128 401,006 401,065 402,329 402,823 405,089	Kronenberg, E. Gerry, J. H. Scales, W. S. Brainerd, F. W. Carranza, M. and Tinoeo, J. M. Rabe, H. Jansen, A. M. J. and V. J. A. M. Hammer, E. G. Gerry, J. H.	Nov. 27, 1888 Jan. 1, 1889 Mar. 5, 1889 Apr. 9, 1889 Apr. 9, 1889 Apr. 30, 1889 May 7, 1889
	62. REI	FRIGERATION	7.—10. Re	EFRIGERATORS.	
396,933	Hulford, W. J			•	Jan. 29, 1889
				AFTING.—4. BELT-SHIFTERS.	
395,201	Barber, A. M. and Gabriel, C				Dee. 25, 1888
	64. JOURNAL BOXES,	PULLEYS, AN	ND SHAF	TING.—13. SHAFT COUPLINGS.	<u> </u>
388,415	Hewins, E. H				Aug. 28, 1888
	66. KNITTING AND	NETTING—C	CIRCULA	R2. Circular Machines.	
386,636	Jones, L., jr				July 24, 1888
	66. KNI	TTING AND N	NETTING	.—7. Stopping.	
387,672 390,891	Yarwood, M. C Newlands, A. M	Aug. 14, 1888 Oet. 9, 1888	397,537	Conner, E. G	Feb. 12, 1889
	67. LAMPS AND	GAS FITTING	S.—5. Dro	OP LIGHTS AND HANGERS.	
385,493 392,228 394,153 394,680	Wood, J. J Russell, C. W Chisholm, D. J Dawes, A	Nov. 6, 1888 Dec. 11, 1888 Dec. 18, 1888	396,897 397,953 399,334 401,304	Siegrist, A Wood, M. M Keller, C. M Russell, C. W. and Drake, J. I  -8. Gas Fittings,	Feb. 19, 1889 Mar. 12, 1889
400,658				o. das Tittinus.	Apr. 2, 1889
	,				

#### 67. LAMPS AND GAS FITTINGS.—13. LAMP CHIMNEYS.

No.	NAME.	DATE.	No.	NAME.	DATE.
393,704	Heimann, S				Nov. 27, 1888
-	67. LAMPS	AND GAS FIT	TINGS.	22. Lamp Shades.	
387,044 389,526 390,440	Brady, T. H Moore, F Brady, T. H	Sept. 11, 1888	390,846 396,146 405,427	Downing, W. W Dean, G. H Melaney, W. II	Jan. 15, 1889
	67. LAMPS A	ND GAS FITTI	INGS.—25	. Lighting Devices.	
388,177	Bridewell, R. F				Aug. 21, 1888
	67. LAM	IPS AND GAS	FITTING	S.—32. Lamps.	
400,140	Stockly, G. W				Mar. 26, 1889
-	67. LAMPS AN	ND GAS FITTI	NGS.—40	Gas Extinguishers.	
393,271	Shaw, N. H				Nov. 20, 1888
******	67. LAMPS AND	GAS FITTING	GS46. I	LANTERNS-SUB-MARINE.	.1
404,390	Dutton, A. L.				June 4, 1889
	67. LAMPS AND G	AS FITTINGS.	.—51. Gas	Burners—Incandescent.	
385,393	Weisser, T				July 3, 1888
	68	. LAUNDRY.	-3. Сьотн	es Lines.	
385,686	Wailes, J. S				July 3, 1888
	. 71. FERT	TILIZERS.—8. S	SEWAGE A	ND NIGHT SOIL.	
387,286	Fewson, H.	Aug. 7, 1888	389,781	Webster, W	Sept. 18, 1888
	72. MAS	SONRY.—2. STO	ONE AND I	Brick Setting.	
393,477	Lake, W				Nov. 27, 1888
	73. MEAS	SURING INSTI	RUMENT	S.—3. Balances.	
391,831	Amet, E. H		~		Oct. 30, 1888
	73. MEASU	RING INSTRU	JMENTS.	-5. Bathometers.	
389,123	Vigil, I. and Revueltas, J. N.				Sept. 4, 1888
	73. MEASUL	RING INSTRUM	MENTS.—	15. Dynamometers.	

#### 73. MEASURING INSTRUMENTS.—19. GRAIN METERS.

No.	NAME.	DATE.	No.	NAME.	DATE.
397 <b>,</b> 594	Holley, W. A. and Malin, W				Feb. 12, 1889
	73. MEASURIN	G INSTRUME	NTS.—28,	OSCILLATING METERS.	
394,562	Dutton, C. N				Dec. 18, 1888
	73. MEASU	RING INSTRU	UMENTS.	—34. Recorders.	
385,900 387,842	Amet, E. H.		392,531	Amet, E. H	Nov. 6, 1888
	73. MEASU	URING INSTR	UMENTS	.—35. Registers.	
396,786	Wagner, G. G	Jan. 29, 1889	401,518	Ross, H. S	Apr. 16, 1889
	73. MEASU	RING INSTRU	MENTS	-38. SACK SCALES.	
399,192	Gill, O. A				Mar. 5, 1889
	73. MEASUR	ING INSTRUM	IENTS.—	46. Spring Scales.	
<del></del>	Smith, W. R. and Washburn,	Nov. 13, 1888	398,519	Lynde, F. C-	Feb. 26, 1889
<b>3</b> 93,325	A. L. Favre, J. C. J. C	Nov. 20, 1888	398,520 398,521	Lynde, F. C Lynde, F. C	Feb. 26, 1889 Feb. 26, 1889
	73. MEASURII	NG INSTRUME	ENTS.—51	. Testing Machines.	
399,549	Olsen, T				Mar. 12, 1889
	73. MEASUR	ING INSTRUM	IENTS.—	52. Thermometers.	
401,348	Haight, H. J			<del></del>	Apr. 16, 1889
	73. MEASU	RING INSTRU	MENTS	-65. Thermostats.	
386,828 388,505 389,096 389,099 389,099 389,100 390,281 391,783 394,220 394,307	Johuson, C. W Petit, H. S. and Bresson, H. S. Newman, E. A Newman, E. A Newman, E. A Newman, E. A Sparrow, F. M Sparrow, F. M	Aug. 28, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888 Oct. 2, 1888 Oct. 30, 1888 Dec. 11, 1888	394,413 394,563 395,748 400,312 400,917 401,200 402,347 403,484 403,937 405,151	Soley, W. H	Dec. 18, 1888 Jan. 8, 1889 Mar. 26, 1889 Apr. 9, 1889 Apr. 30, 1889 May 14, 1889 May 28, 1889
	73. MEASUR	ING INSTRUM	ENTS.—	59. Fare Registers.	
389,857	Scales, E. A				Sept. 18, 1888
	73. MEASURIN			. Telethermometers.	
397,548					Feb. 12, 1889

#### 74. MACHINE ELEMENTS.—7. GEARING.

No.	NAME.	DATE.	No.	NAME.	DATE.
394,734	Stevens, W.L	Dec. 18, 1888	400,274	Van Depoele, C. J	Mar. 26, 1889
	7	5. METALLUR	GY.—1. A	Allors.	
401,338	Farr, H. G				Apr. 16, 1889
	75. MET	CALLURGY.—4	. Furnac	E Accessories.	
401,394	Walsh, E., jr				Apr. 16, 1889
	75. METAI	LURGY.—17.	Reducing	AND SEPARATING.	
391,034	Eames, H. H	Oct. 16, 1888	403,752	Hobbs, J. C	May 21, 1889
	75. METAI	LLURGY.—34.	AMALGAM	TATORS—ELECTRIC.	
386,030 387,347	Rae, J. H Eysaman, A. H	July 10, 1888 Aug. 7, 1888	399,209	Rae, J. H	Mar. 5, 1889
	75. METALLURO	GY.—58. REDUC	ING AND	SEPARATING ALUMINIUM.	
387,876 400,664 400,665	Héroult, P	Apr. 2, 1889	400,666 400,667 400,766	Hall, C. M———————————————————————————————————	Apr. 2, 1889
	75. METALLURGY.	-67. Solution	AND PRE	CIPITATION—CHLORINATION.	<u> </u>
405,824	Bottome, T. D				June 25, 1889
9	75. METALLURGY	68. Solution	AND PRI	ecipitation—Electrolysis.	
391,360 393,526	Eames, H. H.		405,604	Rovello, A	June 18, 1889
	75.	METALLURG	Y.—82. F	ire Brick.	
385,694	Blaszkaye, J				July 10, 1888
,	78.	METAL FORG	ING.—11.	RIVETING.	
385,484	Stitzel, F. and Weinedel, C	<b>,</b>			July 3, 1888
	80. M	ETAL ROLLIN	G.—7. Mi	SCELLANEOUS.	
388,960 391,542 393,755	Ellinger, J. O	Oct. 23, 1888	405,733 405,996	Griscom, W. W.	June 25, 1889 June 25, 1889
	84.	MUSIC.—11. E	EXERCISING	DEVICES.	
396,156	Hale, F. W.				Jan. 15, 1889
					-

## 84. MUSIC.—27. PIANO ATTACHMENTS.

No.	NAME.	DATE.	No.	NAME.	DATE.
396,155	Hale, F. W				Jan. 15, 1889
	•	84. MUSIC	-35. Orga	NS.	,
394,218	Smith, J. A				Dec. 11, 1888
	84. MU	USIC.—37. SELF-	PLAYING	Instruments.	1
403,834	Gilman, W. H				May 21, 1889
		88. OPTICS.—9	. Рнотом	ETERS.	
396,951	Packard, J. W				Jan. 29, 1889
	**************************************	88. OPTICS.—1	5. Teleso	COPES.	
401,229	Trapp, E. A				Apr. 9, 1889
	89. ORI	NANCE.—21. E	LECTRICA	L APPLIANCES.	
396,199	Fiske, B. A.				Jan. 15, 1889
	92.	PAPER MAKII	NG.—1. B	LEACHING.	
396,325	Brin, A. and L. Q	Jan. 15, 1889	398,045	Hermite, E., Paterson, E.J. and Cooper, C. F.	Feb. 19, 1889
		94. PAVING.	—2. Guti	rers.	1
10,980	Locke, S. D. (Reis. of 355,185)				Jan. 29, 1889
	95	. PHOTOGRAP	НΥ.—5. (	Cameras.	t
386,449	Bliss, E. N. and Middleton, J. 1				July 24, 1888
	95. PHOTO	GRAPHY.—25.	PRINTING	AND VIGNETTING.	1
394,221	Steffens, M. J.				Dec. 11, 1888
	96. COATIN	G WITH MET.	\L. <del>-</del> 1. E	LECTRO-DEPOSITION.	1
393,170 395,773	McMurray, L	Nov. 20, 1888 Jan. 8, 1889	397,320 405,452	Ward, J. G. Yale, C. O.	
	98. PNEUMA	TICS.—32. AIR	AND GAS	Pumps—Mechanical.	
392,686	Packard, J. W	Nov. 13, 1888	401,580	Packard, J. W	Apr. 16, 1889
	10	01. PRINTING.	—14. Del	IVERING.	
391,820	Rossney, W. C. and Hunt, C. L				Oet. 30, 1888

#### 101. PRINTING.—15. ELECTROTYPING.

No.	NAME.	Date.	No.	Name.	DATE.
<b>3</b> 85,519	McIndoe, G. F. and J. W	July 3, 1888	401,631	Benedict, G. H. and Furlong, P. M.	Apr. 16, 1889
		101. PRINTING	G.—30. Ro	YTARY.	
404,959	Crowell, L. C				June 11, 1889
	101	PRINTING	-42. Түре-	Writing.	
390,768					Oct. 9, 1888
		OJECTILES.—			
386,281 394,192 405,646	Waddell, M	Dec. 11, 1888	405,647 405,684	Zalinski, E. L. and Smith, H. J. Smith, H. J. and Zalinski, E. L.	
	10	2. PROJECTIL	ES.—11. 1	Primers.	
389,448	Day, S. A				Sept. 11, 1888
	10	2. PROJECTH	LES.—15.	SHELLS.	1
399,881	Graydon, J. W.				Mar. 19, 1889
	102.	PROJECTILES	S.—16. Sн	ell Fuses.	,
399,876	Graydon, J. W	Mar. 19, 1889	399,879	Graydon, J. W	Mar. 19, 1889
	102	. PROJECTILI	ES.—18. T	ORPEDOES.	
401,851	Parsons, H. W				Apr. 23, 1889
	104.	RAILWAYS.—	3. Deade:	NING NOISE.	
390,293	Green, G. F				Oct. 2, 1888
	I	04. RAILWAY	S.—9. Pni	EUMATIC.	
395,130 395,170 398,353	Given, J. L.——————————————————————————————————	Dec. 25, 1888	398,414 398,836	Lieb, C. ALieb, C. A	
		104. RAILWA	YS.—10.	Rails.	
385,701	Euphrat, F				July 10, 1888
	1	04. RAILWAY	S.—18. Tı	RACTION.	
397,830	Caughey, R. C				Feb. 12, 1889

#### 104. RAILWAYS.—19. TURN-TABLES.

No.	NAME.	DATE.	No.	NAME.	DATE.
396,649	Davidson, W	*		,	Jan. 22, 1889
		104. RAILWAY		GNALS.	
385,877 385,963	Peters, C. HSharp, E. A	July 10, 1888 July 10, 1888	390,081 390,993	Inghram, A. GSutherland, J. B	Sept. 25, 1888 Oct. 9, 1888
	104. RAI	LWAYS.—47. T	'RACTION-	-Underground.	
386,732 394,648	Wood, F. W. and Fowler. J Harris, T. W	July 24, 1888 Dec. 18, 1888	397,385 398,294	Phelps, W. S. Van Depoele, C. J.	Feb. 5, 1889 Feb. 19, 1889
-	104. R.	AILWAYS.—94	. Signals	—AUTOMATIC.	
388,023	Curry, F. P	Aug. 21, 1888	402,398	Carter, J. T	Apr. 30, 1889
	. 108	5. RAILWAY (	CARS.—6.	Brakes.	R
388,731	Sims, J. W				Aug. 28, 1888
	105. I	RAILWAY CAI	RS.—17. I.	OCOMOTIVES.	
387,610	Weis, J				Aug. 7, 1888
	105. F	RAILWAY CAR	RS.—22. S.	AFETY CARS.	
386,403	James, J. W				July 17, 1888
	105. RAII	LWAY CARS.—	-28. Cars-	-Steam Street.	
387,726	McDougall, W. M	Aug. 14, 1888	398,209	Weis, F. J	Feb. 19, 1889
	105. I	RAILWAY CAI	RS.—31. S	TREET CARS.	
386,512	Verstraete, E				July 24, 1888
	116.	SIGNALS.—27.	STATION	Indicators.	
393,237	Irving, J. I				Nov. 20, 1888
	120.	STATIONERY	7.—36. PA	PER CLIPS.	
397,472	Seymour, J. B.				Feb. 5, 1889
	121. STEAM EX	NGINES.—23. S	PEED GOV	TERNORS—CENTRIFUGAL.	
398,456	Rumely, W. N				Feb. 26, 1889
	121. STE	AM ENGINES	—43. Tra	APS—EXPANSION.	
399,198	Johnson, W. S				Mar. 5, 1889

#### 122. STEAM BOILERS.—22. FEEDERS.

122. STEAM BOILERS.—22. FEEDERS.									
No.	NAME.	DATE.	No.	NAME.	DATE.				
403,972	Sturtevant, T. L				May 28, 1889				
122. STEAM BOILERS.—5. CIRCULATION.									
399,165	Smith, D. W				Mar. 5, 1889				
123. AIR AND GAS ENGINES.—3. Explosive.									
389,608 390,710 400,754	Skinner, H Shanck, H. K Debonteville, E, D. and Malan- din, L. P. C.	Oct. 9, 1888	403,376 403,379 403,380	Rogers, N. and Wharry, J. ARogers, N. and Wharry, J. ARogers, N. and Wharry, J. A	May 14, 1889				
124. DISTILLATION.—1. AGEING LIQUORS.									
404,682	Cabell, S. G.				June 4, 1889				
125. STONE WORKING.—10. DRILLS.									
394,203	Moldenke, R. G. G	Dec. 11, 1888	405,187	Sperry, E. A	June 11, 1889				
125. STONE WORKING.—14. MINING MACHINES.									
405,188									
126. STOVES AND FURNACES.—73. CAR HEATERS.									
386,322	Howe, T. B								
128. SURGERY.—13. Inhalers and Respirators.									
404,986	Rudolfy, J								
136. STEAM-ENGINE VALVES.—10. STEAM-ACTUATED.									
393,596	Westinghouse, G., jr								
136. STEAM-ENGINE VALVES.—11. THROTTLE.									
400,245	Neu, G. S				Mar. 26, 1889				
137. WATER DISTRIBUTION.—16. Mains and Pipes.									
401,409	Brown, A. H				Apr. 16, 1889				
138. HYDRAULIC MOTORS.—3. ROTARY.									
400,209	Haskins, D. G.				Mar. 26, 1889				
	138. HYDRAULIC MOTORS.—8. ELEVATORS.								
390,033	Otis, C. R				Sept. 25, 1888				

148. METAL TEMPERING, ANNEALING, AND CEMENTATION.—3. TEMPERING AND ANNEALING—METALS GENERALLY.

No.	Name.	DATE.		* ***					
		DATE.	No.	NAME.	DATE.				
338,078	Sedgwick, F								
148. METAL TEMPERING, ANNEALING, AND CEMENTATION.—10. Tempering and Annealing—Applications of Electricity.									
388,645 400,366	Diehl, PSedgwick, F	Aug. 28, 1888 Mar. 26, 1889	401,721	Sedgwick, F	Apr. 16, 1889				
181. ACOUSTICS.—3. TELEPHONES—MECHANICAL.									
386,238 386,980 387,636 387,969	Brear, S. D	July 10, 1888 July 17, 1888 July 31, 1888 Aug. 14, 1888 Aug. 14, 1888 Sept. 18, 1888	390,062 392,233 395,816 399,016 399,635	Bowles, R. C. M Shaver, G. F Mellett, L Butterworth, A. W Shaver, G. F	Sept. 25, 1888 Nov. 6, 1888 Nov. 13, 1888 Mar. 5, 1889 Mar. 12, 1889				
181. ACOUSTICS.—4. Phonographs.									
	Edison, T. A Herrington, G. H		404,850	Littlehales, G. H	June 11, 1889				
185. MECHANICAL MOTORS.—5. MISCELLANEOUS.									
401,207	Randall, C. A								
186. STORE SERVICE.—2. Propulsion.									
386,314	Green, G. F				July 17, 1888				
186. STORE SERVICE.—9. VENDING APPARATUS.									
397,398	Spiegel, W. G	Feb. 5, 1889	397,975	De Redon, C. F	Feb. 19, 1889				

# APPENDIX No. VIII.

#### PART II.

CONSISTING OF A

## NUMERICAL AND CHRONOLOGICAL INDEX OF ALL PATENTS

RELATING TO

# ELECTRICITY

Issued from July 1, 1888, to June 30, 1889, inclusive, giving names of Inventors, numbers and dates of Patents, and the sub-class to which each belongs.



### NUMERICAL INDEX

 $\mathbf{or}$ 

# PATENTS RELATING TO ELECTRICITY

FROM JULY 1, 1888, TO JUNE 30, 1889.

_	TROM JEBT 1, 1000, 10 Jene Do, 1009.			
No.	NAME.	CLASS.	DATE,	
907 914		Petteries selection	Tul- 9 1000	
385,344	Eaton, A. K		July 3, 1888	
335,357	Kelly, J. E	Annunciators Railway signals	July 3, 1888	
385,363		Locomotion	July 3, 1888 July 3, 1888	
385,379	Thomson F	Heaters	July 3, 1888	
385,384 385,385	Thomson, E	do	July 3, 1888	
385,386	Thomson, E		July 3, 1888	
385,388	Thompson, W. C	Telegraphy, fire	July 3, 1888	
385,390	Trippe, S. L	Batteries, secondary	July 3, 1888	
385,393	Weisser, T		July 3, 1888	
385,413	Heysinger, I. W	Locomotion	July 3, 1888	
385,436	Adams, J. S. and Morrell, A. W	Lights, sockets and keys	July 3, 1888	
385,458	Harding, A.	Magneto-electric	July 3, 1888	
385,482	Scribner, C. E	Telephones, systems	July 3, 1888	
385,484	Stitzel, F. and Weinedel, C	Riveting	July 3, 1888	
385,493	Wood, J. J	Drop lights and hangers	July 3, 1888	
385,494	Wright, C. D	Cut-outs, electro-magnetic	July 3, 1888	
385,519	McIndoe, G. F. and J. W	Electrotyping	July 3, 1888	
385,528	Scribner, C. E	Telephones, systems	July 3, 1888	
385,539	Bergman, E. F.	Cut-outs, mechanical	July . 3, 1888	
385,556	Hoke, C. U	Medical and surgical, body-wear	July 3, 1888	
385,558	King, F	Batteries, secondary	July 3, 1888	
385,565	McLaughlin, J. F.	Telegraphy, printing	July 3, 1888	
385,576	Sibley, C. C	Conductors	July 3, 1888	
385,647	Thomson, E	Meters	July 3, 1888	
385,664 385,672	Emmner, J., jr	Telephones, electric	July 3, 1888	
385,675	Hunter, R. M.——————————————————————————————————	Locomotion	July 3, 1888 July 3, 1888	
385,677	Martel, A. F	Railway signals	July 3, 1888	
385,686	Wailes, J. S		July 3, 1888	
385,694	Blaszkaye, J	Fire brick	July 10, 1888	
385,701	Euphrat, F	Rails	July 10, 1888	
385,705	Gaston, J. E.	Lights, arc, positive feed	July 10, 1888	
385,727	Salisbury, W. S.	Locomotion	July 10, 1888	
385,760	Kookogey, W. P.		July 10, 1888	
385,770	Mingle, G. W. and M.	Cut-outs, thermal	July 10, 1888	
385,774	Roberts, DeW. C		July 10, 1888	
385,782	Wheeler, S. S.		July 10, 1888	
385,787		Locomotion		
385,815	Mayo, J. E			
385,826	Sechrist, A			
385,839	Brear, S. D.			
385,846 385,863	Cook, J. A	Telephones, switch-boards		
385,877	Kellogg, M. G	Telephones, systems	July 10, 1888	
385,894	Peters, C. H	Railways, signalsAnnunciators	July 10, 1888 July 10, 1888	
385,900	Amet, E. H.			
385,902	Bentley E. M	Locomotion	July 10, 1888	
385,903		do		
385,915		do		
385,920	De Redon, C. F	Railway signals	July 10, 1888	
385,927	Hazell, J. W	Applications, general	July 10, 1888	
385,928	Heald, E. W	Locomotion	July 10, 1888	
385,943	Mitchell, F. B	Magneto-electric	July 10, 1888	
385,956		Telephones, electric		
385,963	Sharp, E. A	Railway signals	July 10, 1888	
385,964	Sharp, E. A	do	July 10, 1888	
385,974	Vail, T. N	Telephones, systems	July 10, 1888	
385,975	Vail, T. N	do	July 10, 1888	
385,976	Vail, T. N	do	July 10, 1888	
385,977		do		
385,978 385,984	Whitney F P	Applications, general	July 10, 1000	
009,003	Timoney, D. Donners	rippireations, Seneral-management	0 44, 10, 1000	

No.	Name.	Class.	Date.
386,030	Rae, J. H	Amalgamators, electric	July 10, 1888
386,049	Wright, G. H	Railway signals	July 10, 1888
386,059	Cuttriss, C	Telegraphy, automatic	July 10, 1888
386,066	Gridley, F. J	Magnetic locks and bolts	July 10, 1888
386,071	Humans, W	Magneto-electric, hand-machines	
386,073	Jewell, O. H	Purifying water	
386,085	Ries, E. E	Locomotion	
386,086	Ries, E. E.	do	July 10, 1888
386,087	Ries, E. E.	Hostore	July 10, 1888
386,088	Ries, E. E.		July 10, 1888
386,090 386,099	Roberts, I. L. Wightman, M. J. and Lemp, H.	Batteries, galvanic Cut-outs, thermal	July 10, 1888
386,103	Bohmeyer, C	Clocks, electric	
386,111	Cutler, H. H	Insulators	July 17, 1888
386,129	Hotchkiss, Z. P	Transmitters	July 17, 1888
386,149	Meserole, A. V	Batteries, galvanic	July 17, 1888
386,150	Meserole, A. V	do	July 17, 1888
386,175	Wilson, J. C.	Telegraphy, fire	July 17, 1888
386,184	Chesebrough, R. A	Locomotion	July 17, 1888
386,189	Delany, P. B	Indicators	July 17, 1888
386,225	Walker, G. W	Batteries, secondary, applications	
386,238	Clarke, F. E	Telephones, mechanical	July 17, 1888
386,281	Waddell, M	Blasting and fuses	
386,282 386,314	Woods, G. T	Locomotion	
386,322	Green, G. F Howe, T. B	Propulsion	
386,340	Miot, G	Magneto-electric	
386,380	Brown, C. W	Telephones, electric	
386,403	James, J. W	Safety cars	
386,441	Thomson, E	Heaters	
10,944	Westou, E(Reis, of 381,304,	Rheostats	
10,945	Weston, E (Reis. of 381,305.)	do	
386,449	Bliss, E. N. and Middleton, J. F	Cameras	July 24, 1888
386,463	Grah, E	Valve-controllers	
386,512	Verstraete, E	Street cars	
386,541	Ives, E. B.	Telegraphy, railway-car	
386,543	Jarman, A. J.		
386,561	Sawyer, W. H	Conductors	
386,569	Wheelock, B. J. and J. W	Batteries, galvanie	
386,580 386,581	Enos, J. A	Batteries, secondary	
386,597	Enos, J. A		
386,602	Parsons, H. W. and Hoduit, J		
386,636	Jones, L., jr		July 24, 1888
000,000	outer, In Ji	chines.	5 dily 21, 1000
386,646	McLaughlin, J. F.	Telegraphy, printing	July 24, 1888
386,648	Miot, G	Galvanometers	
386,685	Brown, C. E. L	Magneto-electric	
386,729	Townsend, L. and Auten, J. E		
386,732	Wood, F. W. and Fowler, J		
386,754	Muir, J. S	Electrodes	July 24, 1888
386,767	Buleu, G. F		
386,772	Davis, E	Telegraphy, fire	
386,775 386,784	Fritsche, W	Magneto-electric Locomotion	
10,949	Williams, P. G. and Roovers, A. W. (Reis. of 372,441.)	Applications, general	July 24, 1888
386,796	Belfield, R	Systems of distribution	July 31, 1888
386,797	Belfield, R	do	
386,814	Grav, E-		
386,815	Gray, E		
386,828	Johnson, C. W	Thermostats	July 31, 1888
386,860	Williams, P. G. and Roovers, A. W	Applications, general	July 31, 1888
386,886	Kellogg, M. G	Telephones, systems	
386,887	Kellogg, M. G	do	July 31, 1888
386,898	Sellon, J. S		July 31, 1888
386,919	Everitt, P		July 31, 1888
386,925	Lee, C. T.		
386,936	Slattery, M. M. M.		
386,956 386,965	Cole, W. R	Lights, systems	
386,974		Telephones, electric ————————————————————————————————————	
386,980	Hall, A. W		
		Insulators	
386.986		A	01, 1000
386,986 386,992		Galvanometers	July 31, 1888
386,986 386,992 386,993	Lange, P	Galvanometersdo	

#### NUMERICAL INDEX—ELECTRICITY.

No.	NAME.	CLASS.	Date.
007.017		T 1 11	I.l. of test
387,013 387,044		Induction-coils	July 31, 1888 July 31, 1888
387,049	Brady, T. H. Carr, R. L. and Borden, P.	Batteries, galvanic	
387,051	Cheney, F. A	Lightning arresters	
387,117	Stanley, W., jr	Systems of distribution	July 31, 1888
387,123	Thomson, E	Induction-coils	
387,131 387,145	Anthony, W. A Clamer, F. J	Galvanometers	
387,146	Clamer, F. J		
387,160	Guntz, G.		
387,194	Waterhouse, A. G.		
387,195 387,265	Waterhouse, A. G	Alarms, fire	
387,276	Wieseman, A. G	Clocks, electric	
387,286	Fewson, H	Sewage and night-soil	Aug. 7, 1888
387,310	Mather, R. H.	Motors	
387,316	Oreutt, E. L.	Railway signals	
387,343 387,347	Crompton, R. E. BEysaman, A. H	Amalgamators, electric	
387,365	Oreut, E. L	Railway signals	Aug. 7, 1888
387,382	Weems, D. G	Locomotion	Aug. 7, 1888
387,383	Weems, D. G	do	Aug. 7, 1888
387,432	Meston, A. W	Magneto-electric	
387,463 387,464	Vansant, J. A. and Anderson, F. S. Vansant, J. A. and Anderson, F. S.	Rheostatsdo	
387,467	Webster, W., jr	Purifying water	
387,505	Forbes, G	Meters	
387,526	McElroy, J. F	Cut-outs, mechanical	
387,585	Dudley, W. J.		
387,610	Weis, J		
387,615 387,636	Brown, H. P Garl, M	Lights, systems Telephones, mechanical	
387,642	Hewett, E. M.	Batteries, galvanic	Aug. 14, 1888
387,643	Hewett, E. M.	do	
387,645	Kellogg, M. G	Telephones, systems	Aug. 14, 1888
387,654	Overlack, B	Batteries, galvanie	Aug. 14, 1888
387,672 387,679	Yarwood, M. C	Knitting and netting, stopping Batteries, secondary	Aug. 14, 1888 Aug. 14, 1888
387,703	Warner, C. D	Clocks, electric	Aug. 14, 1888
387,704	Warner, C. D.	do	Aug. 14, 1888
387,714	Fiske, B. A	Motors	Aug. 14, 1888
387,718	Hartwell, N. W	Telephones, supports	
387,726 387,732	McDougall, W. M.——————————————————————————————————	Cars, steam, street Cut-outs, mechanical	Aug. 14, 1888
387,839	Woods, G. T	Batteries, galvanic	Aug. 14, 1888
387,842	Amet, E. H		
387,853	Buckingham, C. L. and Lemp, H	Regulators	
387,876 387,888	Héroult, P		
387,889		Telephones, systemsdodo	
387,890		do	
387,932	Thompson, W. H	Lights, systems and appliances	Aug. 14, 1888
387,969	Clark, F. E	Telephones, mechanical	Aug. 14, 1888
387,974 387,988	Hexamer, C. J.		Aug. 14, 1888
388,003	Shallenberger, O. B	Batteries, secondary, applications Meters	
388,004	Shallenberger, O. B	do	
388,008	Ader, C	Circuits and systems	Aug. 21, 1888
388,023	Curry, F. P.	Signals, automatic	Aug. 21, 1888
388,052 388,053	Kellogg, M. G.	Telephones, systems	Aug. 21, 1888 Aug. 21, 1888
355,078	Killin, V. C.——————————————————————————————————	Lights, arc, gravity feed, gear-clutch Tempering and annealing metals	Aug. 21, 1888
388,091	Van Rysselberghe, F	Telcgraphy, reed	Aug. 21, 1888
388,092	Van Rysselberghe, F	do	Aug. 21, 1888
388,093 388,140	Waddell, M	Magneto-electric	Aug. 21, 1888
388,141	McLaughlin, J. F	Telegraphy, printingdo	Aug. 21, 1888 Aug. 21, 1888
358,142	McLaughlin, J. F	do	Aug. 21, 1888
388,143	McLaughlin, J. F	do	Aug. 21, 1888
388,177	Bridewell, R. F.	Lighting devices	Aug. 21, 1888
388,181	Cassard, H	Batteries, galvanic	Aug. 21, 1888
388,229 388,242	Thode, C. W. F.	Tolerhones electric	Aug. 21, 1888 Aug. 21, 1888
	Barney, W. C.	Telephones, electric	
	Baudot, J. M. E	Telegraphy, printing	Aug. 21, 1888
388,244 388,345	Baudot, J. M. E Benardos, N	Telegraphy, printing	
388,244		Heatersdo	Aug. 21, 1888 Aug. 21, 1888

No.	Name.	CLASS.	DATE.
388,283	Kellogg, M. G	Telephones, systems	Aug. 21, 1888
388,294	McGowen, J. J.	Igniting devices	Aug. 21, 1888
388,300	O'Kelly, J	Steering and propulsion	Aug. 21, 1888
388,312	Scarles, B	Batteries, galvanic	Aug. 21, 1888
388,333	Barnard, W. T.	Telegraphy, reed	Aug. 21, 1888
388,335	Beattie, J., jr	Batteries, secondary	Aug. 21, 1888
388,344	Dey, C. E		Aug. 21, 1888
388,357	Guest, J. H		Aug. 21, 1888
388,358	Guest, J. H	Telegraphy, fire	
388,415	Hewins, E. H		
388,430	Meserole, A. V		
388,438	Nutter, F. H	Alarms, burglar	
388,442	Phipps, E. H	Couductors, uuderground	
388,453	Scribner, C. E		
388,454 388,477	Scribner, C. E	Conductors	
388,481	Delany, P. B		Aug. 28, 1888
388,482	Eisenhart, C. A.		
388,487	Harris, A. E		
388,505	Petit, H. S. and Bresson, H. S		
388,512	Van Gestel, J. T		Aug. 28, 1888
388,513	Van Gestel, J. T	Magneto-electric	Aug. 28, 1888
388,514	Van Gestel, J. T		Aug. 28, 1888
388,538	Daft, L	do	Aug. 28, 1888
388,581	Pratt, H. P.	Medical and surgical, body-wear	Aug. 28, 1888
388,583	Raab, K		Aug. 28, 1888
388,592	Siebel, J. E	Incrustation	Aug. 28, 1388
388,594	Spencer, L. W	Lights, arc	Aug. 28, 1888
388,601	Trippe, S. L-	Batteries, secondary	Aug. 28, 1888
388,622	Brainerd, F. W.	Clocks, electric	Aug. 28, 1888
388,628	Carr, R. L. and Borden, P	Batteries, galvanic	Aug. 28, 1888
388,631 388,645	Chase, S. A	Telegraphy, fire	Aug. 28, 1888
388,668	Diehl, PGibson, C. D. P.		Aug. 28, 1888 Aug. 28, 1888
388,690	Kirwan, G. H	Indicators	
388,697	Lea, J	Lights, arc, positive feed, gear-clutch	Aug. 28, 1888
388,707	Morris, H. G	Meters	Aug. 28, 1888
388,723	Schardt, B. and Jones, G.	Lights, arc, special features	
388,731	Sims, J. W	Brakes	
388,746	Van Gestel, J. T	Batteries, secondary	Aug. 28, 1888
388,753	Batley, J	Motors	
388,757	Burns, J	Lights, filaments and carbons	Aug. 28, 1888
388,791	Scribner, C. E	Telephones, systems	Aug. 28, 1888
388,803 388,836	Woods, G. T Crane, M. G	Telegraphy, railway-carBells	Aug. 28, 1888 Sept. 4, 1888
388,837	Crockett, C. H. and Allen, C. C	Annunciators	Sept. 4, 1888
388,859	Green, G. F.		Sept. 4, 1888
388,862	Griswold, H. P		Sept. 4, 1888
388,869	Hill, H. T		Sept. 4, 1888
388,876	Humans, W	Annunciators	Sept. 4, 1888
388,877	Humans, W	Magneto-electric, hand-machines	Sept. 4, 1888
388,922	Sheehy, R. J	Telephones, systems	Sept. 4, 1888
388,955		Locomotion	
388,960		Metal-working, miscellaneous	
389,001	Piles A I	Applications, tools and machines	Sept. 4, 1888
389,011 389,029	Waterhouse A C	Magneto-electric	Sept. 4, 1888
389,030	Waterhouse A G	Regulatorsdo	Sept. 4, 1000
389,037	Wilkinson E	Applications, tools and machines	Sept. 4, 1088
389,062	Delany P. B	Circuits and systems	Sept. 4, 1888
389,080	Humans W	Bells	Sept. 4, 1888
389,096	Newman, E. A.	Thermostats	Sept. 4, 1888
389,097		Valve-controllers	
389,098		Thermostats	
389,099	Newman, E. A.	do	Sept. 4, 1888
389,100	Newman, E. A.	do	Sept. 4, 1888
389,122	Turner, W. A	Railway signals	Sept. 4, 1888
389,123		Bathometers	
389,124		Batteries, thermal	
389,125	Weston, E	P-tt-vi	Sept. 4, 1888
389,140 389,142	Eaton, A. K.	Batteries, galvanic	Sept. 4, 1888
389,142		Telegraphy, printing	
389,184	Zech Otto	Magneto-electric	Sept. 4, 1888
389,186	Askew, C. B. and Pumpelly, J. K	Batteries, secondary	Sept. 11, 1888
389,187	Baldwin, J. W	Medical and surgical, body-wear	Sept. 11, 1888
389,189		Locomotion	

No.	Name.	CLASS.	DATE.
389,196	Chase, H. A	Electro-magnets	Sept. 11, 1888
389,197	Chase, H. A	Motors	Sept. 11, 1888
389,207	Eastwick, A. E	do	Sept. 11, 1888
389,226	Irwin, J	Railway siguals	Sept. 11, 1888
389,229 389,230	Knight, W. H	Locomotiondo	Sept. 11, 1888 Sept. 11, 1888
389,254	Shepardson, G. D	do	Sept. 11, 1888
389,265	· Thomson, E		Sept. 11, 1888
389,272	Weston, E	Alarms, burglar	Sept. 11, 1888
389,273 389,274	Weston, E	Recorders	Sept. 11, 1888
389,278	Bentley, E. M	Locomotion	Sept. 11, 1888 Sept. 11, 1888
389,279	Bentley, E. M	do	Sept. 11, 1888
389,280	Bergmann, S		Sept. 11, 1888
389,281	Blackwell, J. L	Locomotion	Sept. 11, 1888
389,282 389,297	Griscom, W. W	Lighting, systems	Sept. 11, 1888 Sept. 11, 1888
389,314	McIntire, C	Connectors	
389,337	Stitzel, F. and Weinedel, C	Relays and sounders	Sept. 11, 1888
389,352	Anthony, W. A	Motors	Sept. 11, 1888
389,356 389,369	Bickley, C. G Edison, T. A	Batteries, secondary, applications Lights, incandescent	Sept. 11, 1888 Sept. 11, 1888
389,421	Tag, W. and Smith, S. C.	Igniting devices	Sept. 11, 1888
389,423	Tirrell, J. P	Bells	Sept. 11, 1888
389,448	Day, S. A	Primers	Sept. 11, 1888
389,455	Elliott, R. M		Sept. 11, 1888
389,526 389,532	Moore, Frank Serson, J	Lamp shadesBatteries, galvanic	Sept. 11, 1888 Sept. 11, 1888
389,601	Rosebrugh, A. M	Telephones, mechanical	Sept. 18, 1888
389,608	Skinner, H.	Air and gas engines, explosive	Sept. 18, 1888
389,626	Wirsching, A	Time checks	Sept. 18, 1888
389,638 389.640	Conant, T. P.	Batteries, secondary, applications	Sept. 18, 1888 Sept. 18, 1888
389,658	Knight, W. H	Magneto-electric	Sept. 18, 1888
389,676	Trippe, S. L.	Batteries, galvanic	Sept. 18, 1888
389,678	Turner, T. G	Telegraphy, fire	Sept. 18, 1888
359,692	Downs, H. T	Igniting devices	Sept. 18, 1888
389,729 389,752	Wiest, J Lauckert, E. F. H. H	Heaters	Sept. 18, 1888 Sept. 18, 1888
389,758	Morrell, A. W	Lighting, systems	Sept. 18, 1888
389,764	Rutter, N. P.	Medical and surgical, body-wear	Sept. 18, 1888
359,779	Thomson, E	Magneto-electric	Sept. 18, 1888
389,781 389,795	Webster, W De Ferranti, S. Z	Sewage and night-soilSystems of distribution	Sept. 18, 1888 Sept. 18, 1888
389,796	Doriot, C	Motors	Sept. 18, 1888
389,799	Estabrook, W. W	Applications, general	Sept. 18, 1888
389,812	Hicks, T. H	Magneto-electric	Sept. 18, 1888
359,822	Nicholson, J. D., McElroy, W. J. and McTighe, T. J.	Locomotion	Sept. 18, 1888
389,838 389,839	Dubinski, B	Induction-coils	Sept. 18, 1888 Sept. 18, 1888
389,853	Ongley, C. E	Applications, tools and machines	Sept. 18, 1888
389,357	Scales, E. A.	Fare registers	Sept. 18, 1888
339.870	Pishop, J. D.		Sept. 25, 1888
389,876 389,882	Paure, C. A	MotorsBatteries, secondary	Sept. 25, 1888 Sept. 25, 1888
389,883	Field, S. D	Telegraphy, automatic	Sept. 25, 1888
389,838	Heysinger, I. W	Lights, sockets and keys	Sept. 25, 1888
389,894	Meyers, W. G. and Coward, F. E		Sept. 25, 1888
389,935 389,943	McDonald, W. HSilliman, R. F	Batteries, secondary, applications Conductors, underground	Sept. 25, 1888 Sept. 25, 1888
359,974	Pfannkuche, G. and A	Magneto-electric	Sept. 25, 1888
390,001	Brown, L. W	Towers	Sept. 25, 1888
390,033	Otis, C. R	Elevators	Sept. 25, 1888
390,058	Bernheim, E. I		Sept. 25, 1888
390,062 390,067	Bowles, R. C. M	Telephones, mechanical Galvanometers	Sept. 25, 1888 Sept. 25, 1888
390,081	Inghram, A. G		Sept. 25, 1888
390,101	Tweedale, E	Applications, general	Sept. 25, 1888
390,113	Bullough, J	do	Sept. 25, 1888
390,115 390,180	Mather, W. and Hopkinson, J. and E	Magneto-electric	Sept. 25, 1888 Sept. 25, 1888
390,180	Acheson, E. G		Oct. 2, 1888
390,229	Hempel, A	Separators	Oct. 2, 1888
390,230	Hoefling, C. E	Clocks, electric	Oct. 2, 1888
390,245	Mather, R. H	Lights, arc, gravity feed, clutch	Oct. 2, 1888 Oct. 2, 1888
390,231	Butz, A. M.	I Her mostats	001. 2, 1000

No.	Name.	CLASS.	D	ATE.
390,293	Green, G. F	Railways, deadening noise	Oct.	2, 1888
390,301	Hill, W. S	Magneto-electrie	Oct.	2, 1888
390,310	Packard, J. W.	Lights, filaments and earbons		2, 1888
390,318	Thomson, E	Magneto-electrie		2, 1888
390,329	Williatowsky, A. F. L	Circuit-closers		-2, 1888
390,354	Epplé, L	Medical and surgical, body-wear		2, 1888
390,413	Tesla, N	Systems of distribution		2, 1888
390,414	Tesla, N	Magneto-electric		2, 1888
390,415	Tesla, N	Dalaman da		2, 1888
390,428	Wright, P	Relays and repeaters		2, 1888
390,439	Bradley, C. S.	Magneto-electric Lamp shades		2, 1888 2, 1888
390,440 390,462	Edison, T. A	Lights, filaments and carbons		2, 1888
390,463	Edmunds, H	Batteries, secondary, applications		2, 1888
390,464	Edmunds, H	do		2, 1888
390,481	Johnson, W. A	Cut-outs, mechanical		2, 1888
390,544	Woodward, J. H.	Electrodes	Oct.	2, 1888
390,575	D'Unger, R	Telephones, electric	Oct.	2, 1888
390,597	Hewett, E. M.	Batteries, galvanie	Oct.	2, 1888
390,619	Ries, E. E.			2, 1888
390,642	Bennett, J. B	Keys		9, 1888
390,674	Humphreys, D.	Batteries, galvanie		9, 1888
390,675	Humphreys, D.			9, 1888
390,676	Humphreys, D			9, 1888 9, 1888
390,677 390,710	Shanek, H. K			9, 1888
390,710	Tesla, N	Magneto-electrie		9, 1888
390,741	Adams, T. E.			9, 1888
390,748	Brewer, H. J			9, 1888
390,768	Ganse, H. D			9, 1888
390,778	Harris, P. A.			9, 1888
390,795	Neu, G. S	Magnetie locks and bolts	Oct.	9, 1888
390,802	Patten, F. J		Oct.	9, 1888
390,820	Tesla, N			9, 1888
390,833	Barrett, A. and Zentner, J			9, 1888
390,846	Downing, W. W			9, 1888
390,891	Newlands, A. M.		Oct.	9, 1888
390,903 390,904		Lights, incandescent		9, 1888 9, 1888
390,905	Ries, E. E			9, 1888
390,906		Magneto-electrie		9, 1888
390,910		Regulators		9, 1888
390,911		Systems of distribution		9, 1888
390,912		Magneto-electrie		9, 1888
390,921	Van Depoele, C. J	Motors	Oct.	9, 1888
390,930	Westinghouse, G., jr	Regulators		9, 1888
390,955	Emmner, J., jr			9, 1888
390,990		Systems of distribution		9, 1888
390,993	Sutherland, J. B	Railways, signals	Oet.	9, 1888
391,010	Bentz, II	Meters	Oct.	16, 1888
391,034	Eames, H. H.	Reducing and separating	Oct.	16, 1886
391,070 391,114	Rush C. F	Magneto-electric	Oct.	16 1999
391,224	Blair, J. B	Regulators Magneto-electric, hand machines	Oct.	16, 1889
391,229	Butler, H. W	Batteries, secondary	Oct.	16, 1888
391,270	Pfannkuche, G	Magneto-electric	Oct.	16, 1888
391,276	Sax, J	Annunciators	Oct.	16, 1888
391,285	Warth, A	Apparel, cutting	Oct.	16, 1888
391,319	Harris, L. S	Regulators	Oct.	16, 1888
391,351		Cut-outs, mechanical		
391,356	Collins, W. II	Telephones, electric	Oct.	16, 1888
391,360	Eames, H. H	Electrolysis	Oct.	16, 1888
391,364		Medical and surgical, body-wear		
391,394		Locomotion		
391,437 391,446		Systems of distribution		
391,447	Wright P	Clocks, electric Locomotion	Oct.	93 1889
391,468	Griscom, W. W.	Batteries, secondary, applications	Oct.	23 188
391,477	Libber, H. W	Lights, are, positive feed	Oet.	23, 1888
391,505	Brewer, H. J	Batteries, galvanie	Oct.	23, 1888
391,512	Cleveland, W. B	Cut-outs, mechanical	Oct.	-23, 1888
391,517	Cuff, J. E	Conductors	Oct.	-23, 1888
391,542	Madden, A. F.	Metal working, miscellaneous.	Oct.	-23, 1888
391,547	Milliken, G. F.	Bells	Oct.	23, 1888
391,568	Waters, B. E	Indicators	Oct.	23, 1888
391,587	Dallas, M	Conductors, underground Motors	Oct.	23, 1888
391,590				

No.	Name.	Class.	DATE.
391,592	Eddy, A. H	Galvanometers	Oct. 23, 1888
391,593	Eddy, A. H	Motors	Oct. 23, 1888
391,594	Eddy, A. H	Cut-outs, thermal	
391,595	Edison, T. A.	Systems of distribution	Oct. 23, 1888
391,596	Edison, T. A.	Lights, incandescent	
391,605	Hall, E. J	Conductors	
391,720	Pratt, H. P.	Medical and surgical, body-wear	Oct. 23, 1888
391,761	Nutting, S. E	Lights, arc, gravity feed, clutch	
391,762	Scribner, C. E		
391,783	Connelly, W. A.	Thermostats	
391,792	Heysinger, I. W	Locomotion	
391,793	Heysinger, I. W	Victoria	
391,797 391,815	Hyer, W. E Packard, J. W	Motors Lights, filaments and carbons	
391,816	Packard, J. W.	do	
391,820	Rossney, W. C. and Hunt, C. L	Printing, delivering	
391,831	Amet, E. H	Balances	
391,839	Davis, E	Telephones, calls	
391,853	McDill, H. C	Cut-outs, electro-magnetic	
391,855	Ongley, C. E	Circuit-closers	
391,917	Randall, J. D.	do	Oct. 30, 1888
391,923	Slattery, M. M. M.	Lighting, systems	Oct. 30, 1888
391,943	Bryant, W. C	Cut-outs, mechanical	Oct. 30, 1888
391,954	Field, S. D	Regulators	
391,969	Himmer, V.	Clocks, electric	
392,018	Emerson, V. H	Galvanometers	Oct. 30, 1888
392,033	Jacques, W. W	Telephones, systems	
392,034 392,080	Johnson, O. B	Cut-outs, mechanical	
392,090	Stout, G. H. Zipernowsky, C., Déri, M. and Bláthy, O. T.	Batteries, secondary	
392,103	Campbell, H. F	Conductors, anti-inductive	
392.114	Fralev, G. B.		
392,127	Love, J. C.	Locomotion	
392,158	Lemp, H		
392,159	Lemp, H	Lights, filaments and carbons	
392,167	Roberts, I. L		
392,213	McElroy, W. J	System of distribution	
392,228	Russell, C. W.	Drop-lights and hangers	Nov. 6, 1888
392,230	Scales, W. S.		
392,233	Shaver, G. F	Telephones, mechanical	
392,244	Walter, H	Batteries, secondary	
392,248	Wilson, J. C	Telephones, systems	
392,301	Bailey, R. M		
392,326 392,370	Gould, C. C.	do	
392,385	Sellon, R. P. and Mordey, W. M. Weston, E.	RegulatorsGalvanometers	
392,386	Weston, E.	do	
392,387	Weston, E.	do	
392,393	Young, J. C		
392,400	Belfield, R		
392,403	Blake, F	Telephones, systems	Nov. 6, 1888
392,437	Lange, P.	Meters	Nov. 6, 1888
392,438	Lange, P.	do	
392,439	Lange, P	do	Nov. 6, 1888
392,440	Lehman, J. H	Igniting devices	
392,443	Long, M. W	Railway signals	
392,444	Long, M. W	do	
392,470	Stanley, W., jr	Motors	
392,471	Stanley, W., jr	do	
392,476	Weston, E	Galvauometers	
392,477 392,478	Weston, E	do	
392, <del>1</del> 78 392,490	Weston, E	Magneto-electric	
392,513	Heisler, C		Nov. 6, 1888
392,520	McTighe, J. J	Lights, filaments and carbons	Nov. 6, 1888
392,531	Amet, E. H	Recorders	Nov. 6, 1888
392.573	Thompson, C. H.	Batteries, secondary	
392,574	Thompson, C. H.	do	Nov. 6, 1888
392,577	Wurts, A	Meters	
392,604	Hale, G. C., Barrett, A. and Zentner, J	Telegraphy, fire	
392,633	Perkins, C. G.	Cut-outs, mechanical	Nov. 13, 1888
392,641	Slocum, E. L	Telcgraphy, fire	Nov. 13, 1888
392,660	Bidwell, B	Magneto-electric	Nov. 13, 1888
392,664	Chase, H. A	Locomotion	Nov. 13, 1888
392,665	Cleverly, H. A.	Igniting devices	Nov. 13, 1888
392,666	Coad, T	Lights, sockets and keys	
392,675	Hunter, R. M.	Locomotion	Nov. 13, 1888

No.	NAME.	CLASS.	DATE.
392,679	Lee, G. M	Valve controllers	Nov. 13, 1888
392,686	Paekard, J. W.	Air and gas pumps, mechanical	Nov. 13, 1888
392,698	Smith, W. R. and Washburn, A. L.	Spring scales	Nov. 13, 1888
392,701	Thaxter, G. E	Igniting devices	Nov. 13, 1888
392,724 392,736	Farnham, I. H	Cut-outs, electro-magnetic	Nov. 13, 1888 Nov. 13, 1888
392,750	Ries, E. E.	Locomotion	Nov. 13, 1888
392,765	Thomson, E	Magneto-electric	Nov. 13, 1888
392,766	Trafford, W	Annunciators	Nov. 13, 1888
392,772	Allen, O	LocomotionConductors, anti-inductive	Nov. 13, 1888 Nov. 13, 1888
392,775 395,816	Mellett, L		
392,826	Sellon, J. S	Batteries, secondary	
392,832	Talbot, C. N	Telegraphy, fire	
392,836		Batteries, galvanie	
392,838 392,843	Bergmann, S	Recorders	
392,855	Coburn, E. B	Regulators	
392,863	Heywood, B	Locomotion	Nov. 13, 1888
392,890	Stanley, W., jr	Regulators	
392,914	Field, S. D	Telegraphy, multiplex	
392,930 392,953	Patten, F. J. Herrington, G. H.	Motors Phonographs	Nov. 13, 1888 Nov. 13, 1888
392,967	Patten, F. J	Locomotion	Nov. 13, 1888
392,970	Ritchie, F.	Annunciators	Nov. 13, 1888
392,971		Locomotion	
393,012	Kames, J	do	Nov. 20, 1888 Nov. 20, 1888
393,013 393,029	Poitevent A	Insulating materials	
393,040		Girders and columns	
393,072	Marquand, A. J.	Incrustation	Nov. 20, 1888
393,073		Systems of distribution	
393,078 393,088		Annunciators Galvanometers	
393,123	Root, F. H		Nov. 20, 1888
393,125	Schulte, W	Applications, general	Nov. 20, 1888
393,132	Wagner, F. C.	Meters	Nov. 20, 1888
393,146 393,147	Edmunds, H	Batteries, secondary, applications	
393,159	Kronenberg, E.	Clocks, electric	
393,165	Lockwood, T. D.		
393,170	McMurray, L	Electro-deposition	
393,183	Stocker, W. F.		
393,192 393,203	Thayer, R. Bartley, L. C.	Applications, general Batteries, galvanic	Nov. 20, 1888 Nov. 20, 1888
393,224	Field, S. D	Locomotion	Nov. 20, 1888
393,237	lrving, J. I	Station indicators	Nov. 20, 1888
393,243	Ker, J. B. and Crawford, J		
393,266 393,271	Riker, A. L. Shaw, N. H		Nov. 20, 1888 Nov. 20, 1888
393,275		Locomotion	Nov. 20, 1888
393,276	Van Depoele, C. J.	do	Nov. 20, 1888
393,277	Van Depoele, C. J	do	Nov. 20, 1888
393,278 393,280	Van Depoele, C. J.	do	Nov. 20, 1888
393,282	Wildt, E. A	Magnetic locks and bolts	Nov. 20, 1888
393,304	Haskins, C. H	Igniting devices	Nov. 20, 1888
393,315	Stocker, W. F.	Meters	Nov. 20, 1888
393,317 393,323	Van Depoele, U. J.	Locomotion	Nov. 20, 1888
393,325	Favre, J. C. J. C	Spring scales	Nov. 20, 1888
393,337	Lane, F. A	Electro-magnetic	Nov. 20, 1888
393,346	Whelan, J	Conductors, underground	Nov. 20, 1888
393,348	Atkins, C. H	Separators	Nov. 27, 1888
393,353 393,365	Griseom W W	Batteries, galvanicCut-outs, mechanical	Nov. 27, 1888
393,373	Keller, F. J. and Carnes, J. W	Motors	Nov. 27, 1888
393,389	Paine, W. J	Applications, tools and machines	Nov. 27, 1888
393,391	Ram, G. S.	Applications, tools and machines Lights, filaments and carbons	Nov. 27, 1888
393,395	Roosevelt, H. L.	Batteries, galvanic	Nov. 27, 1888
393,396 393,402	Smith A C	Valve-confrollers Show boxes and cards	Nov. 21, 1888 Nov. 27, 1888
393,405	Turner, D. B	Lights, arc. gravity feed, clutch	Nov. 27, 1888
393,422	Craig, T. E	Magneto-electric	Nov. 27, 1888
393,431	Griggs, A. C	Railway signals.	Nov. 27, 1888
393,447 393,448	Pfannkuehe, G	Lights, arc, gravity feed, gear-clutch Regulators	Nov. 27, 1888
000,110	I IMITIAUCITO, C	Trogulators	1107. 21, 1000

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No.	NAME.	CLASS.	DATE.
393,469	Griscom, W. W	Magneto-electric	Nov. 27, 1888
393,470	Griscom, W. W	Batteries, secondary, applications	Nov. 27, 1888
393,473 393,477	Johnson, E. H Lake, W		Nov. 27, 1888
393,508	Kellogg, M. G		Nov. 27, 1888 Nov. 27, 1888
393,509	Kellogg, M. G	do	Nov. 27, 1888
393,525 393,526	Shaw, N. H		Nov. 27, 1888
393,529	Smith, E. L		Nov. 27, 1888
393,558	Harms, C. F		Nov. 27, 1888 Nov. 27, 1888
393,572	Paget, L	Locomotion	Nov. 27, 1888
393,573	Paget, L		Nov. 27, 1888
393,574 393,575	Paget L	Lights, arc, gravity feed, clutch	Nov. 27, 1888 Nov. 27, 1888
393,576	Paget, L	do	Nov. 27, 1888
393,577	Paget, L	do	Nov. 27, 1888
393,578	Paget, L		Nov. 27, 1888
393,590 <b>3</b> 93,59d	Smith, D. W Westinghouse, G., jr	Valves, steam-actuated	Nov. 27, 1888 Nov. 27, 1888
393,612	Brown, C. W.	Telephones, systems	Nov. 27, 1888
393,622	Dallas, M	Locomotion	Nov. 27, 1888
393,624 393,625	Durieux, C.	11	Nov. 27, 1888
393,636	Durieux, C	Magneto-electric	Nov. 27, 1888 Nov. 27, 1888
393,637	Gerry, J. H	Clocks, electric	Nov. 27, 1888
393,639	Gethins, J. L	Batteries, galvanic	Nov. 27, 1888
393,644 393,657	Hermann, S Packer, R. and Cochran, I. E., jr	Insulating materials	Nov. 27, 1888
393,704	Heimann, S	Alarms, burglar Lamp chimneys	Nov. 27, 1888 Nov. 27, 1888
393,710	Lüngen, A	Bells	Nov. 27, 1888
393,711	Lüngen, A	Magnetic locks and bolts	Nov. 27, 1888
393,733 393,741	Wollin, W. F. and Werline, E. H	Lights, sockets and keys	Nov. 27, 1888
393,742	Collins, W. C	Medical and surgical, body-wear Magneto-electric	Dec. 4, 1888 Dec. 4, 1888
393,744	Currie, S. C. C	Batteries, secondary, applications	Dec. 4, 1888
393,745	Daft, L	Magneto-electric	Dec. 4, 1888
393,749 393,751	France, J. R	Locomotion Celluloid	Dec. 4, 1888 Dec. 4, 1888
393,752	France, J. R.	do	Dec. 4, 1888
393,755	Griscom, W. W	Metal-working, miscellaueous	Dec. 4, 1888
393,755	Griscom, W. W.	Systems of distribution	
393,757 393,814	Griscom, W. W. Burns, P. C.	Batteries, secondary, applicationsBatteries, galvanic	Dec. 4, 1888 Dec. 4, 1888
393,823	Flotron, E. and De LaBastie, F. B. A. R	Conductors, underground	Dec. 4, 1888
393,824	Goodridge, W. M	Telephones, switch-boards	Dec. 4, 1888
393,828 393,833	Hall, A. E. Kiel, W	Applications, general	Dec. 4, 1888 Dec. 4, 1888
393,849	Nutting, S. E	Miscellaneous compositions	
393,865	Stitzel, F. and Weinedel, C	Railway siguals	Dec. 4, 1888
393,887	Couche, J	Winding bobbins, weft-wind	
393,954 393,955	Woodward, H	Batteries, secondary	
393,998		Bells	
394,015	Salisbury, W. S.	Locomotion	Dec. 4, 1888
394,035		Regulators	
394,036 394,037	Van Depoele, C. J.	Motors	Dec. 4, 1888 Dec. 4, 1888
394,038		Locomotiondo	
394,039	Van Depoele, C. J	do	Dec. 4, 1888
394,049 394,062		Time checks	
394,002		Locomotion	
394,031		Annunciators	
394,090	Woodward, H	Batteries, thermal	Dec. 4, 1888
394,095 394,100		Magneto-electricBatteries, secondary, applications	
394,139		Locomotion	
394,153	Chisholm, D. J	Drop lights and hangers	Dec. 11, 1888
394,161	Dulles, W., jr	Locomotion	Dec. 11, 1888
394,164 394,172	Grav E	Magneto-electric, hand-machines	Dec. 11, 1888
394,173	Griffith, A. and Burbank, H. A	Telephones, switches	Dec. 11, 1888
394,180	Heisler, C	Cut-outs, mechanical	Dec. 11, 1888
394,192	Macbeth, J.	Blasting and fuses	Dec. 11, 1888
	Manuall C S		
394,195 394,203	Maxwell, G. S.	PrillsConductors, underground	Dec. 11, 1888

394,220   8 394,221   8			
394,220   8 394,221   8	Smith, J. A	Organs	Dec. 11, 1888
	Sparrow, F. M.	Thermostats	Dec. 11, 1888
394.230	Steffens, M. J.		Dec. 11, 1888
	Vail, T. N. and Seely, J. A.	Telephones, systems	
- /	Rand, E. R.	Batteries, galvanic Telegraphy, printing	
	Sheffield, G. VSparrow, F. M	Thermostats	
	Cadwallader, B	Applications, general	
	Lloyd, E. L	Insulators	
		Thermostats	
394,417	Van Depoele, C. J	Motors	Dec. 11, 1888
	Duncan, L	Batteries, secondarydo	Dec. 11, 1888
		do	
		do	
		Cut-outs, electro-magnetic	Dec. 11, 1888
394,491	Johns, J. H		Dec. 11, 1888
	Thornycroft, J. I	Indicators	Dec. 11, 1888
	Van Depoele, C. J.	Motors	
	Latshaw, ZClark, W. C	Annunciators	
	Dutton, C. N	Oscillating meters	
	Easton, L. F	Thermostats	
	Griscom, W. W.	Cut-outs, mechanical	Dec. 18, 1888
394,613	Roberts, I. L	Batteries, galvanic	Dec. 18, 1888
	Roberts, I. L. and Brevoort, H. L.	do	
	Roberts, I. L	do	
	Roberts, I. L	do	Dec. 18, 1888 Dec. 18, 1888
	Smith, M. H	Locomotion	Dec. 18, 1888
	Widdifield, W. P. and Bowman, A. H	Car brakes	Dec. 18, 1888
	Brevoort, H. L. and Roberts, I. L	Batteries, galvanie	
394,642	Conant, T. P	Batteries, secondary, applications	Dec. 18, 1888
	Harris, T. W	Traction, underground	
	Wright, R. D.	Batterics, galvanic	
394,680   1 394,697   3	Dawes, A Jamieson, P. F	Drop-lights and hangers	Dec. 18, 1888 Dec. 18, 1888
	Shallenberger, O. B	Galvanometers	Dec. 18, 1888
	Stevens, W. L.	Gearing	Dec. 18, 1888
	Stevens, W. L.	Locomotion	Dec. 18, 1888
	Milliken, G. F	Telegraphy, fire	Dec. 18, 1888
	Schefbauer, R	Lights, arc, positive feed, gear-clutch	Dec. 18, 1888
	Tregoning, J Bacon, A. H	Magneto-electric	Dec. 18, 1888
	Beattie, J., jr	Medical and surgical, body-wear Batteries, galvanic	Dec. 18, 1888 Dec. 18, 1888
	Bradley, C. S.	Magneto-electric	Dec. 18, 1888
	Bradley, C. S	do	
	Casey, J. F	Telephones, systems	Dec. 18, 1888
394,833	Casey, J. F.	do	Dec. 18, 1888
394,834	De Formenti S 7	Soda-water apparatus	Dec. 18, 1888
		Connectors	
		Telegraphy, fire, alarms and extinguishers	
		Meters	
394,881	Reckenzaun, A	do	Dec. 18, 1888
394,883	Reithmann, G. W.	Magneto-electric	Dec. 18, 1888
394,887   8 394,892   7	Thomson F	Locomotion	Dec. 18, 1888
		Heaters Batteries, secondary	
394,905	Belding, W. S.	Magneto-electric	
	Durant, G. F. and Bailey, H. L.	Telephones, systems	
394,925	Hoyt, A. J	Telegraphy, circuit-closers	Dec. 18, 1888
394,946	Wood, J. B.	Telephones, ealls	Dec. 18, 1888
	Balsley, U. H.		
	Baxter, W., jr		
	Colling, S Dewey, M. W	Medical and surgical, body-wear Telegraphy, automatic	
	Dewey, M. W	Circuits and systems	
	Farnlam, I. H	Telephones, switch-boards	
394,978	Hauss, D. J	Magneto-electric	Dec. 25, 1888
	Rice, E. W., jr	do	
395,018	Thomson, E	Meters	Dec. 25, 1888
395,019 395,028	Railey M and Warner T	Magneto-electric	Dec. 25, 1888
395,028	Siemens. W	Miscellaneous compositions	Dec. 25, 1888 Dec. 25, 1888
395,096	Watson, A	Alarms	Dec. 25, 1888
395,101	Wilson, J. C.	Telegraphy, fire	Dec. 25, 1888

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No.	NAME.	CLASS.	DATE.
395,102	Wilson, J. C	Telegraphy, fire	Dec. 25, 1888
395,111	Barnes, W. A.	Telegraphy, fire, alarms and extinguishers	Dec. 25, 1888
395,112	Barnes, W. A	do	Dec. 25, 4888
395,116 395,123	Bergmann, S Edison, T. A	Rheostats Magneto-electric	
395,130	Given, J. L	Railways, pneumatic	Dec. 25, 1888
395,137	Hayes, H. V	Telephones, systems	Dec. 25, 1888
395,151 395,157	Louris, F. F.	Advertising, automatic devices Magneto-electric	
395,163	Meloon, I. L. and Whiting, P. S	Railway signals	Dec. 25, 1888
395,170	Perkins, E. A. and Stuart, D. C.	Railways, pneumatic	Dec. 25, 1888
395,187 395,201	Smith, W. B. Barber, A. M. and Gabriel, C.	Boats, buoys and safesBelt shifters	Dec. 25, 1888
395,207	Bowen, C. H	Conductors, insulators	
395.215	Davies, D. H. and Tourtel, J. M.	Lighting systems	
395,260 395,299	Belding, W. S	Magneto-electric	
395,311	Cameron, H. F. DeB		
395,315	Coleman, J. P		
395,317 395,357	Dubéy, E. A. Scales, W. S.		Jan. 1, 1889 Jan. 1, 1889
395,377		Batteries, secondary, applications	Jan. 1, 1889
395,378	Brush, C. F	do	Jan. 1, 1889
395,379 395,399	Brush, C. F		Jan. 1, 1889 Jan. 1, 1889
395,421	Cockburn, A. C		
395,427	Delany, P. B	Telegraphy, automatic	Jan. 1, 1889
395,442 395,476	Jennings, B		Jan. 1, 1889 Jan. 1, 1889
395,492	Gartner, A		Jan. 1, 1889
395,508	Patten, F. J	Telegraphy, multiplex	Jan. 1, 1889
395,509 395,510	Patten, F. J		
395,524	Patten, F. J. Thayer, R.	Applications, tools and machines	
395,533	Woods, G. T	Cut-outs, electro-magnetic	
395,546 395,556	Conner, W. A	Conductors	Jan. 1, 1889
395,575	Field, S. D	Telegraphy, multiplex	
395,584	Phipps, E. H	Conductors, underground	Jan. 1, 1889
395,609	Brangs, P. H	Cut-outs, mechanical	Jan. 1, 1889
395,613 395,614	Dewey, M. W.	Telegraphy, printing	Jan. 1, 1889 Jan. 1, 1889
395,622	Kelly, J. F.	Magneto-electric	Jan. 1, 1889
385,667	Smith, D. G	Railway signals	
395,682 395,703	Ambler, A. I Jenkins, W. F	Locomotion	
395,706	Kitsee, I	Batteries, galvanic	Jan. 8, 1889
395,748	Kent, J. W. and Orr, R	Thermostats	Jan. 8, 1889
395,755 395,761	Pawlowski, J	Lights, arc, special features Locomotion	Jan. 8, 1889 Jan. 8, 1889
395,769	Coad, T	Batteries, galvanic	Jan. 8, 1889
395,773 395,781		Electro-deposition	
395,782		Indicatorsdo	
395,783	Hollerith, H	do	Jan. 8, 1889
395,835 395,836	Kookogey, W. P	Batteries, galvanic	Jan. 8, 1889 Jan. 8, 1889
395,837	Kookogev, W. P	Batteries, secondary, applicationsBatteries, galvanic	Jan. 8, 1889
395,851	Schwartz, L. H. A.	Cordage, warping	Jan. 8, 1889
395,862	Winslow, G. E.	Indicators	Jan. 8, 1889
395,878 395,932		HeatersInduction-coils	
395,936	Wightman, M. J	Lighting systems	Jan. 8, 1889
395,050 395,958	Capek, J. V	Heaters	Jan. 8, 1889
395,958	Dewey, M. W	Telegraphy, fire	Jan. 8, 1889 Jan. 8, 1889
395,961	Dyer, R. N	Locomotion	Jan. 8, 1889
395,962	Edison, T. A	Lights, incandescent	Jan. 8, 1889
395,963 395,974	Haves, H. V. and White A. C.	Lights, filaments and carbons	Jan. 8, 1889 Jan. 8, 1889
396,009	Thomson, E	Heaters	Jan. 8, 1889
396,010	Thomson, E	do	Jan. 8, 1889
396,011 396,012	Thomson, E	do	Jan. 8, 1889 Jan. 8, 1889
396,013	Thomson, E	do	Jan. 8, 1889
396,014	Thomson, E		Jan. 8, 1889
396,015	Thomson, E	do	Jan. 8, 1889

No.	Name.	CLASS.	Date.
396,039	Thomson E	Heaters	Jan. 8, 1889
396,086		Magneto-electric	Jan. 15, 1889
396,121		Motors	Jan. 15, 1889
396,124		Locomotion	
396,146	Dean, G. H.	Lamp shades	Jan. 15, 1889
396,149		Magneto-electric	Jan. 15, 1889 Jan. 15, 1889
396,155 396,156	Hale, F. W	Exercising devices	Jan. 15, 1889
396,176	Simpson, D. J	Connectors	Jan. 15, 1889
396,195	Daft, L	Magneto-electric	Jan. 15, 1889
396,196	Daft, L	Locomotion	Jan. 15, 1889
396,199	Fiske, B. A.——————————————————————————————————	Ordnance, electrical appliancesRailway signals	Jan. 15, 1889 Jan. 15, 1889
396,207 396,212	Long, J. V	Medical and surgical, body-wear	Jan. 15, 1889
396,213	Lugo, O	Batteries, secondary, applications	Jan. 15, 1889
396,214	Lugo, O.	do	Jan. 15, 1889
396,241	Shawhan, J. F.	Lighting systems	Jan. 15, 1889
396,269	Coerper, C	Motors	
396,270	Van Depoele, C. J	Heaters	
396,310 396,311	Van Depoele, C. J	Locomotion	
396,312	Van Depoele, C. J.		
396,313	Van Depoele, C. J.	do	Jan. 15, 1889
396,314	Van Depoele, C. J.	Motors	
396,325	D'Humy, P. R. De F	Paper-making, bleaching	Jan. 15, 1889 Jan. 15, 1889
396,329 396,334	Gilson, S. H	Batteries, galvanic Conductors, insulators	Jan. 15, 1889
396,342	Scheithauer, B	Batteries, galvanic	
396,355	Dyer, I. T.	Magneto-electric	Jan. 15, 1889
396,356	Edison, T. A	Separators	Jan. 15, 1889
396,365		Railway signals	Jan. 15, 1889
396,367	Roberts, I. L	Batteries, secondary	Jan. 15, 1889
396,368 396,369		do	
396,385	Arbogast, C. and Kunzler, J. W	Telegraphy, fire, alarms and extinguishers	Jan. 22, 1889
396,403	Jacquemier, M. J. R.	Meters	Jan. 22, 1889
396,407		Conductors, underground	
396,422	Pfannkuche, GSperry, E. A		
396,439 396,450	Zoeller, T. J.		Jan. 22, 1889
396,465		Telegraphy, relays and sounders	
396,543	Cobb, H. B	Connectors	Jan. 22, 1889
396,549	Dickerson, E. N., jr	Systems of distribution	Jan. 22, 1889
396,557	Gmür, B. and Flatz, O	Magneto-electric, hand-machines	Jan. 22, 1889
396,579 396,580	Loomis, O. P	Cut-outs, thermal Regulators	Jan. 22, 1009 Jan. 22, 1889
396,581	Loomis, O. P.	Magneto-electric	Jan. 22, 1889
396,582		Systems of distribution	Jan. 22, 1889
396,583	Loomis, O. P	Lights, sockets and keys	Jan. 22, 1889
396,602	Rice, E. W., jr.	Regulators	Jan. 22, 1889
396,603	Short S. H.	Systems of distribution Locomotion	Jan. 22, 1889
396,618 396,632		Cut-outs, mechanical	
396,633	Weems, D. G	Locomotion	Jan. 22, 1889
396,645	Card, G. F	Meters	Jan. 22, 1889
396,649	Davidson, W	Railways, turn-tables	Jan. 22, 1889
396,667 396,681	Rrush C F	Alarms, burglarBatteries, secondary, applications	Jan. 42, 1889 Jan. 20, 1880
396,701	Lehy, G. B.	Alarms, burglar	Jan. 29, 1889
396,723	Beers, C. B	Magnetic locks and bolts	Jan. 29, 1889
396,725	Blades, H. H	Regulators	Jan. 29, 1889
396,734	Dewey, M. W.	Telegraphy, multiplex	Jan. 29, 1889
396,748 396,749	Kookogev W P	Railway signals	Jan. 29, 1889
396,750		do	
396,769	Sellon, J. S	Batteries, secondary	Jan. 29, 1889
396,770	Sellon, J. S.	do	Jan. 29, 1889
396,786	Wagner, G. G	Registers	Jan. 29, 1889
396,791 396,792	Williams I T	Motors	Jan. 29, 1889
396,795		Anuunciators	
396,836	Shawhan, J. F	Heaters	Jan. 29, 1889
396,847	Ashen, P	Conductors, insulators	Jan. 29, 1889
396,867	Grant, P	Regulators	Jan. 29, 1889
396,870	Heinrichs, C. F.	Batteries, galvanic	Jan. 29, 1889
396,871 396,880	Knowles, E. R	Cut-outs, mechanical	Jan. 29, 1889
50,000	, , , , , , , , , , , , , , , , , , , ,	and only moderations and a second	Jul. 20, 1000

No.	Name.	CLASS.	DATE.
396,897	Siegrist, A	Drop-lights and hangers	Jan. 29, 1889
396,920	Chamberlain, J. C.	Cut-outs, thermal	Jau. 29, 1889
396,932	Holt, A. J.	Regulators	
396,933 396,940	Hulford, W. J.	Refrigerators Cut-outs, electro-magnetic	
396,941	Knowles, E. R.	Magneto-electric	Jan. 29, 1889 Jan. 29, 1889
396,942	Knowles, E. R	do	Jan. 29, 1889
396,951	Packard, J. W.	Photometers	Jan. 29, 1889
396,958	Sellon, J. S.	Batteries, secondary	Jan. 29, 1889
396,983 397,006	Cade, B Kester, J. F	Telegraphy, railway-car Regulators	Jan. 29, 1889 Jan. 29, 1889
397,007	Kester, J. F	Magneto-electric	Jan. 29, 1889
397,049	Cade, B	Railway signals	Jan. 29, 1889
10,980	Locke, S. D.—————(Reissue of 355,185.)	Paving, gutters	
397,109 397,111	Bussmann, O. Soldon, E. J	Cut-outs, mechanicalBatteries, galvanic	Feb. 5, 1889 Feb. 5, 1889
397,111	Egan, C. E	do	Feb. 5, 1889
397,171	Crosby, E. H	Telegraphy, fire, alarms and extinguishers	Feb. 5, 1889
397,176	Ferdinand, A. B	Telephones, calls	Feb. 5, 1889
397,194	Martin, M	Telegraphy, fire	
397,218	Bergmann, S Callender, W. M	Lights, incandescent, special features	Feb. 5, 1889
397,221 397,235	Hunter, R. M	Conductors, underground Batteries, secondary	Feb. 5, 1889 Feb. 5, 1889
397,260	Wellens, R.	Valve-controllers	Feb. 5, 1889
397.270	Boda, A. Z	Railway signals	Feb. 5, 1889
397,284	Griffith, A. and Burbank, H. A.	Telephones, calls	
397,295 397,300	Mack, W. B	Dynamometers Conductors, underground	
397,320	Ward, J. G	Electro-deposition	
397,331	Barrett, J. A	Telephones, anti-induction devices	
397,340	Cohen, R. L	Magneto-electric	
397,364	Holcombe, A. G.	Annunciators	
397,385 397,392	Phelps, W. S	Railways, traction, underground	
397,398	Spiegel, W. G	Magneto-electric	
397,407	Webster, W., jr	Electrolysis	
397,418	Crandall, J. E	Telegraphy, lightning arresters	Feb. 5, 1889
397,423	Greaves, J	Applications, general	
397,424 397,439	Griscom, W. W. and Weidner, H. N	Motors	
397,443	Shaw, W. A	Batteries, secondary	
397,451	Van Depoele, C. J	Locomotion	Feb. 5, 1889
397,461	Guttman, L	Induction-coils	
397,466 397,472	McCoy, A. T	Telegraphy, printingStationery, paper clips	
397,474	Stanley, L. T	Electrodes	
397,479	Vandegrift, J. A	Lights, incandescent	
397,489	Clamer, F. J. and Hendrickson, J. G	Batteries, galvanic	
397,492 397,526	Eickemeyer, R	Magneto-electric	
397,537	Thompson, C. M	Batteries, galvanicKnitting and netting, stopping	Feb. 12, 1889
397,533	Cutler, H. H.	Meters	
397,548	Hoffmann, C. G.	Telethermometers	Feb. 12, 1889
397,550	Hunter, R. M	Magneto-electric	
397,553 397,557	Johnston, W. C., jr Knowles, E. R	Batteries, secondary	
397,594	Holley, W. A. and Malin, W.	Grain meters	
397,607	Paget, L	Batteries, secondary	
397,608	Paget, L.	do	
397,613 397,616	Rice, E. W., jr	Regulators	
397,650	Thomson, E	Batteries, secondary	
397,657	Meyer, E	Alarms	Feb. 12, 1889
397,678	Wilson, F	Theatrical appliances	
397,702		Motors	
397,705 397,715	Edison, T. A Hammer, W. J	Magneto-electricCut-outs, mechanical	
397,729	Knowles, E. R.		
397,754	Rheiner, H. S.	Lights, filaments and carbons	Feb. 12, 1889
397,773	Blades, H. H	Regulators	Feb. 12, 1889
397,790		Medical and surgical, body-wear	
397,796 397,806		Medical and surgical, body-wcar	Feb. 12, 1889 Feb. 12, 1889
397,817	Patten, F. J	Motors	
397,826	Andrews, A. E.	Cut-outs, mechanical	Feb. 12, 1889
397,830	Caughey, R. C	Railways, traction	Feb. 12, 1889
397,838	Denio, W. L.	Telegraphy, circuit-closers	Feb. 12, 1889

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No.	NAME.	CLASS.	DATE.
397,857	Hunter, R. M	Heaters	Feb. 12, 1889
397,875	Sprague, F. J.	Locomotion	Feb. 12, 1889
397,880	Toulmin, M Galvin, J. A	Railway gates, electric Lighting systems	Feb. 12, 1889 Feb. 19, 1889
397,906 397,910	Gutmann, L.	Induction-coils	Feb. 19, 1889
397,945	Sperry, E. A.	Batteries, galvanic	Feb. 19, 1889
397,953	Wood, M. M.	Drop-lights and hangers	Feb. 19, 1889
397,965 397,966	Buruley, W	Batteries, galvanic	Feb. 19, 1889 Feb. 19, 1889
397,969	Cross, E. D.	Batteries, galvanie	Feb. 19, 1889
397,975	De Redou, C. F	Vending apparatus	Feb. 19, 1889
397,977	Dressler, C. E	Telegraphy, automatic	Feb. 19, 1889
397,992 398,025	Merkel, G. H	Chemicals, metalloids Insulators	Feb. 19, 1889 Feb. 19, 1889
398,035	Dieuleveult, U	Telegraphy, circuits and systems	Feb. 19, 1889
398,045	Hermite, E., Paterson, E.J. and Cooper, C. F-	Paper-making, bleaching	Feb. 19, 1889
398,069	Nagle, A. F.	Alarms	Feb. 19, 1889
398,075 398,101	Pedersen, J. T Webster, W., jr	Batteries, secondaryElectrolysis	Feb. 19, 1889 Feb. 19, 1889
398,121	Bergmann, S	Rheostats	Feb. 19, 1889
398,122	Birdsall, É. T.	Friction generators	Feb. 19, 1889
398,132	Cross, E. D De Baun, S	Medical and surgical, body-wear	Feb. 19, 1889 Feb. 19, 1889
398,133 398,144	Geary, J	Alarms, burglar	Feb. 19, 1889
398,194	Timmis, I. A	Batterics, secondary	Feb. 19, 1889
398,209	Weis, F. J		Feb. 19, 1889
398,222 398,272	Brill, J. A	Batteries, thermal	
398,276	Pierce, A. M.		Feb. 19, 1889
398,288	Stirling, C. C	Cut-outs, mechanical	Feb. 19, 1889
398,294		Railways, uuderground	
398,314 398,327	Currier, H. L.——————————————————————————————————		Feb. 19, 1889 Feb. 19, 1889
398,353	Stitzel, F. and Weiuedel, C	Railways, pneumatic	Feb. 19, 1889
10,986	Belfield, R(Reissue of 392,400)	Applications, general	Feb. 19, 1889
398,402 398,409	Hunter, R. M.	Locomotion Batteries, secondary	
398,414	Lieb, C. A	Railways, pneumatic	Feb. 26, 1889
398,420	McCarthy, L. A	Alarms, burglar	Feb. 26, 1889
398,441	Patterson, W. R.	Conductors	
398,442 398,456	Patterson, W. R. Rumely, W. N.	Steam engines, speed governors, centrifugal	
398,457	Shallenberger, O. B	Motors	
398,458	Shallenberger, O. B	do	
398,489 398,498	Brady, T. H	Locomotiondodododo	
398,510	Hill, W. S	Cut-outs, mechanical	
398,519	Lynde, F. C	Spring scales	Feb. 26, 1889
398,520 398,521	Lynde, F. C		
398,560	Weller, F. A. and Rietzel, A. F.	Cut-outs, mechanical	Feb. 26, 1889
398,561	Weller, F. A. and Rietzel, A. F	do	Feb. 26, 1889
398,566	Wright, W. H. S.	Cut-outs, thermal	Feb. 26, 1889
398,577 398,613		Car brakes Railway signals	
398,614	Healy, C. L	Telegraphy, dynamo	Feb. 26, 1889
398,661	Short, S. H	Locomotion	Feb. 26, 1889
398,662 398,663		do	
398,668	Sperry, E. A.	Regulators	Feb. 26, 1889
398,713	Enos, J. A	Indicators	Feb. 26, 1889
398,731	James, J. W.	Medical and surgical, baths	Feb. 26, 1889
398,737 398,744	Nutting, S. E	Batteries, galvanic	Feb. 26, 1889
398,769	Currie, S.C. C	Connectors	Feb. 26, 1889
398,774	Edison, T. A	Lights, incandescent	Feb. 26, 1889
398,794 398,805	Steinhilber A	Motors———————————————————————————————————	Feb. 26, 1889
398,814	Blake, H. T	Locomotion	Mar. 5, 1889
398,833	Higgins, F. H. W	Telegraphy, printing	Mar. 5, 1889
398,836	Lieb, C. A.	Railways, pneumaticLights, arc, special features	Mar. 5, 1889
398,870 398,896	Kahan, S. and Craven, A. W	Time alarms	Mar. 5, 1889
398,906	Silvey, W. L	Lights, arc, gravity feed, gear	Mar. 5, 1889
398,907		Lights, arc, gravity feed, gear-clutch	
398,912 398,913	Thomson, E	Heaters Magneto-electric	Mar. 5, 1889
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No.	Name.	CLASS.	DATE.
398,914	Thomson, E	Heaters	Mar. 5, 1889
398,926		Regulators	
398,927	Balet, J. W	do	Mar. 5, 1889
398,963	Butterworth, A. W	Locomotion	
399,016	Coffin C. I.	Telephones, mechanical Heaters	
399,052	Knowles, E. R	Batteries, secondary	
399,054	Lane, G. M	Lights, arc, gravity feed, gear-clutch	
399,057	Lecoultre, I. E	Telegraphy, circuit-closers	
399,059	Lugo, O	Motors	
399,084	Schmalz, J. B. and Faulkner, J. B		Mar. 5, 1889
399,088 399,091	Silvey, W. L.	Locomotion	Mar. 5, 1889 Mar. 5, 1889
399,092	Smith, H. W		Mar. 5, 1889
399,128	Brainerd, F. W	Clocks, electric	Mar. 5, 1889
399,134	Dillon, L. W	Cut-outs, mechanical	
399,135	Dillon, L. W	do	Mar. 5, 1889
399,137	Dyer, R. N	Locomotion Regulators	Mar. 5, 1889
399,147	O'Neil, J	Telegraphy, automatic	
399,155	Palmer, H. J	Railway signals	
399,163	Ricketson, J. C	Indicators	Mar. 5, 1889
399,165	Smith, D. W	Steam boilers, circulation	Mar. 5, 1889
399,168	Tag, W. and Smith, S. C	Igniting devices, manual	Mar. 5, 1889
399,192	Gill, O. A	Sack scales	
399,198   399,209	Johnson, W. S.	Steam engines, triple-expansionAmalgamators, electric	
399,213	Robertson, J. H.	Magneto-electric	
399,218	Stillwell, L. B	Systems of distribution	
399,219	Stillwell, L. B	do	Mar. 5, 1889
399,224	Wagner, F. C	Regulators	
399,228	Hopkins, G. I	Telegraphy, railway-car	
10,989 399,236	Vansize, W. B(Reissue of 393,529) Blair, J. B	Telephones, systemsLocomotion	Mar. 5, 1889
399,269	Kelly, J. W	Telephones, switch-boards	Mar 12, 1889
399,274	Meserole, A. V	Batteries, secondary	Mar. 12, 1889
399,291	Siemens, W	Conductors, lead-covered	Mar. 12, 1889
399,292	Siemens, W	Galvanometers	
399,305	Wilson, C. H	Cut-outs, thermal	
399,314 399,320	Burnley, W Du Laney, G. L	Telegraphy, circuits and systems Magneto-electric	
399,326	Griggs, A. C.	Connectors	Mar 12, 1889
399,328	Hayes, J. A	Magneto-electric	Mar. 12, 1889
399,329	Heywood, B	do	Mar. 12, 1889
399,331	Hull, W. S. and Anderson, J. C.	Railway signals	Mar. 12, 1889
399,334	Keller, C. M	Drop-lights and hangers	
399,336 399,341	Lauckert, E. F. H. H. McFeely, R. F. and Potter, H. V	Applications, tools and machines	
399,343	Penney, W. L. and Little, T	Conductors, underground	Mar. 12, 1889
399,372	Bradley, C. S	Locomotion	Mar. 12, 1889
399,375	Burden, J. A	Separators	Mar. 12, 1889
399,377	Carty, J. J	Anti-induction devices	Mar. 12, 1889
399,400	Harvey, W. B	Cut-outs, electro-magnetic	Mar. 12, 1889
399,401 399,402	Higham, D.————————————————————————————————————	Regulatorsdodo	
399,403	Higham, D.	Magneto-electric	Mar. 12, 1889
399,404	Higham, D.	do	Mar. 12, 1889
399,409	Hunter, R. M	Locomotion	Mar. 12, 1889
399,416	Kronenberg, E	Igniting devices, manual	
399,474	Benjamin, F. P	Railway signals	
399,497 399,505	Cassidy, J. C. Dudley, W. J	Lights, incandescent, special features Felephones, calls	
399,507	Eddy, A. II	Motors	Mar. 12, 1889
399,534	Hicks, T. H	Systems of distribution	Mar. 12, 1889
399,535	Huber, J. L	Batteries, secondary	Mar. 12, 1889
399,549	Olsen, T	Testing machines	Mar. 12, 1889
399,550	Paiste, H. T Putnam, T. A. B	Cut-outs, mechanical	
399,556 399,579	Stitzel, F. and Weinedel, C	Railway signals	Mar. 12, 1880
399,591	Williams, P. G. and Roovers, A. W	Applications, general	Mar. 12, 1889
399,599	Condict, G. H	Locomotion	Mar. 12, 1889
339,635	Shaver, G. F	Telephones, mechanical	
399,639	Westinghouse, G., jr	System of distribution	
200 010	Balet, J. W	Magneto-electric	Mar. 19, 1889
399,646		Telephones electric	
399,646 399,666 399,716	Hitchcock, C. AWhittier, C	Telephones, electricApplications, tools and machines	Mar. 19, 1889

400,180   Bentley, E. M.				
1897.55   Egan, C. E.   Lights, sockets and keys   Mar. 19, 1889   309,756   Schardt, B. and Jones, G.   Lights, are, special features.   Mar. 19, 1889   309,756   Schardt, B. and Jones, G.   Lights, are, special features.   Mar. 19, 1889   309,850   Thomson, E. and Wighman, M. J.   Morrow   Mar. 19, 1889   309,850   Thomson, E. and Wighman, M. J.   Morrow   Mar. 19, 1889   309,850   Graydon, J. W.   Scholardtors   Mar. 19, 1889   309,850   Graydon, J. W.   Scholardtors   Mar. 19, 1889   309,875   Graydon, J. W.   Scholardtors   Mar. 19, 1889   309,876   Graydon, J. W.   Medical and surgical, body-wear   Mar. 19, 1889   400,012   Rogers, T. B., and Bartlett, S. H.   Game apparatus   Mar. 19, 1889   400,012   Rogers, T. B., and Bartlett, S. H.   Game apparatus   Mar. 19, 1889   400,028   Mar. 19, 1889   400,038   Scholardtors   Mar. 29, 1889   400,138   Scholardtors   Mar. 29, 1889   400,138   Scholardtors   Mar. 29, 1889   400,139   Scholardtors   Mar. 29, 1889   400,139   Scholardtors   Mar. 29, 1889   400,130   Scho	No.	NAME.	CLASS.	DATE.
1897.55   Egan, C. E.   Lights, sockets and keys   Mar. 19, 1889   309,756   Schardt, B. and Jones, G.   Lights, are, special features.   Mar. 19, 1889   309,756   Schardt, B. and Jones, G.   Lights, are, special features.   Mar. 19, 1889   309,850   Thomson, E. and Wighman, M. J.   Morrow   Mar. 19, 1889   309,850   Thomson, E. and Wighman, M. J.   Morrow   Mar. 19, 1889   309,850   Graydon, J. W.   Scholardtors   Mar. 19, 1889   309,850   Graydon, J. W.   Scholardtors   Mar. 19, 1889   309,875   Graydon, J. W.   Scholardtors   Mar. 19, 1889   309,876   Graydon, J. W.   Medical and surgical, body-wear   Mar. 19, 1889   400,012   Rogers, T. B., and Bartlett, S. H.   Game apparatus   Mar. 19, 1889   400,012   Rogers, T. B., and Bartlett, S. H.   Game apparatus   Mar. 19, 1889   400,028   Mar. 19, 1889   400,038   Scholardtors   Mar. 29, 1889   400,138   Scholardtors   Mar. 29, 1889   400,138   Scholardtors   Mar. 29, 1889   400,139   Scholardtors   Mar. 29, 1889   400,139   Scholardtors   Mar. 29, 1889   400,130   Scho		•		
1997.55   King. F	399,738		Telegraphy, fire, alarms and extinguishers	Mar. 19, 1889
399,786   Schardt, B. and Jones, G		Egan, C. E	Lights, sockets and keys	
Magneto-electric		Schoolt R and Jones G	Lights are special features	
1998.50   Thomson, E. and Wightman, M. J.	399,780	Thomson, E		
399,826   Brooks, A. A.   Conductors   Mar. 19, 1889   399,826   Brooks, A. A.   Conductors   Mar. 19, 1889   399,826   Graydon, J. W.   Shell ruses   Mar. 19, 1889   399,828   Graydon, J. W.   Shell ruses   Mar. 19, 1889   399,858   Van Depoele, C. J.   Locomotion   Mar. 19, 1889   399,858   Van Pepoele, C. J.   Locomotion   Mar. 19, 1889   400,021   Rogers, T. B. and Bartlett, S. H.   Game apparatus   Mar. 19, 1889   400,022   Modring, W. H. and Gilbert, C. S. Alarms   Mar. 19, 1889   400,023   Beatley, E. M.   Locomotion   Mar. 19, 1889   400,023   Beatley, E. M.   Locomotion   Mar. 19, 1889   400,023   Beatley, E. M.   Locomotion   Mar. 29, 1889   400,103   Shaw, F.   Locomotion   Ma		Thomson, E. and Wightman, M. J.		
Shell fases		Blades, H. H		
Supplementary		Brooks, A. A		
Special   Spec		Graydon, J. W		
399,852   Van Depoele, C. J.   Locomotion   Mar. 19, 1889	399,879	Graydon, J. W.		
400,021   Modoring, W. H. and Gilbert, C. S. Alarms   Mar. 19, 1889   400,028   Beutley, E. M.   Locomotion   Mar. 26, 1889   400,058   Banker, I. S.   Annuciators   Mar. 26, 1889   400,058   Kammeyer, G. E. K.   Batteries, galvanie   Mar. 26, 1889   400,058   Kammeyer, G. E. K.   Batteries, galvanie   Mar. 26, 1889   400,128   Shaw, F.   Magneto-electrie   Mar. 26, 1889   400,139   Silvey, W.   Lamps   Mar. 26, 1889   400,149   Stone, R. C.   Transmitter   Magneto-electrie   Mar. 26, 1889   400,141   Stone, R. C.   Transmitter   Mar. 26, 1889   400,141   Stone, R. C.   Transmitter   Mar. 26, 1889   400,149   Bentley, E. M.   Locomotion   Mar. 26, 1889   400,149   Bentley, E. M.   Locomotion   Mar. 26, 1889   400,181   Bentley, E. M.   Lights, arc, positive feed, gear-clutch   Mar. 26, 1889   400,294   Haskins, D. G.   Hydrulic motors, rotary   Mar. 26, 1889   400,294   Horne, W. L.   Lights, systems and appliances   Mar. 26, 1889   400,224   Horne, W. L.   Lights, systems and appliances   Mar. 26, 1889   400,224   Horne, W. L.   Lights, systems and appliances   Mar. 26, 1889   400,225   Kitese, I.   Locomotion   Mar. 26, 1889   400,225   Kitese, I.   Locomotion   Mar. 26, 1889   400,225   Kitese, I.   Latteries, galvanie   Mar. 26, 1889   400,225   Kitese, I.   Latteries, secondary   Mar. 26, 188		Van Depoele, C. J	Locomotion	
400,023   Wodring, W. H. and Gilbert, C. S.   Alarms	399,954			
400,050   Banker, I. S.   Locomotion   Mar. 26, 1889   400,056   Kammeyer, C. E. K		Rogers, T. B. and Bartlett, S. H		
400,058   Kammeyer, C. E. K		Reutley E M		
400,128   Saw F.		Bunker, I. S		
Magneto-electric		Kammeyer, C. E. K	Batteries, galvanic	
400,140   Stockly, G. W		Shaw, F		
400,110   Stockly, G. W		Stowert R E		
400,171   Stone, R. C		Stockly, G, W	Lamps	
		Stone, R. C	Transmitters	Mar. 26, 1889
400,181   Bentley, E. M.		Bentley, E. M.	Locomotion	Mar. 26, 1889
400,125   Bentley, E. M.		Bentley, E. M.	do	
400,199   Edwards, E. A		Bentley, E. M.	do	
400,214   Horne, W. L.		Edwards, E. A	Lights, arc. positive feed, gear-clutch	
		Haskins, D. G	Hydranlic motors, rotary	Mar. 26, 1889
Mar. 20, 1889   Mar. 20, 188		Horne, W. L.	Lights, systems and appliances	Mar. 26, 1889
400,225   Kitsee, I		Imschenetzky, A	Batteries, galvanic	Mar. 26, 1889
Aug. 26, 1889   Aug. 26, 188		Kitsee, I		
A00,227   Kitsee, I				
		Kitsee, I	Batteries, galvanic	Mar. 26, 1889
Mor.				
1400,245				
400,274				
400,274   Van Depoele, C. J.   Gearing		Sperry, E. A.	Telegraphy, fire	Mar. 26, 1889
100,300   Chase, H. A		Van Depoele, C. J.		
400,308   Colby, E. J		Chase H A		
400,308		Colby, E. J		
400,312		Cranmer, W. C. and Arnold, S. W	Conductors, underground	Mar. 26, 1889
400,315		Davis, E. H. and Westervelt, R		
400,325   Ginochio, N. B.				
400,325   Ginochio, N. B   Telephones, magnetic   Mar. 26, 1889		Edison, T. A	Separators	
Mar. 26, 1889   Miller, W. H		Giuochio, N. B.	Telephones, magnetic	Mar. 26, 1889
Mar. 26, 1889   Mol. 25				
Tempering and annealing, applications				
400,375   Van Depoele, C. J   Locomotion   Mar. 26, 1889				
Mar. 26, 1889   Month   Mar. 26, 1889   Mar.		Van Depoele, C. J.	Locomotion	Mar. 26, 1889
Huuter, R. M.   Batteries, secondary   Mar. 26, 1889	400,378	Weston, E.	Lights, incandescent	Mar. 26, 1889
Batteries, galvanic				
400,463				
Apr. 2, 1889   Apr.				
400,476         Nutting, S. E         Lights, arc, gravity feed, gear-clutch         Apr. 2, 1889           400,479         Parke, J. G         Igniting devices, manual         Apr. 2, 1889           400,486         Rice, E. W., jr         Systems of distribution         Apr. 2, 1889           400,492         Rousseau, D         Igniting devices, manual         Apr. 2, 1889           400,515         Thomson, E         Systems of distribution         Apr. 2, 1889           400,520         Tuttle, C. R         Telephones, supports         Apr. 2, 1889           400,523         Van Rysselberghe, F         Telegraphy, reed         Apr. 2, 1889           400,525         Waddell, W. H         Railway signals         Apr. 2, 1889           400,552         Donaldson, R. S         Conductors         Apr. 2, 1889           400,551         Morton, W. J         Telephones, electric         Apr. 2, 1889           400,552         Rockwell, F. C         Lights, incandescent, special features         Apr. 2, 1889           400,650         Rockwell, F. C         Lights, incandescent, special features         Apr. 2, 1889           400,661         Gipperich, A         Galvanometers         Apr. 2, 1889	400,464	Lawshe, S. R	Lightuing rods	Apr. 2, 1889
400,479         Parke, J. G.         Igniting devices, manual         Apr. 2, 1889           400,486         Rice, E. W., jr         Systems of distribution         Apr. 2, 1889           400,492         Rousseau, D         Igniting devices, manual         Apr. 2, 1889           400,515         Thomson, E         Systems of distribution         Apr. 2, 1889           400,520         Tuttle, C. R         Telephones, supports         Apr. 2, 1889           400,523         Van Rysselberghe, F         Telegraphy, reed         Apr. 2, 1889           400,525         Waddell, W. H         Railway signals         Apr. 2, 1889           400,552         Donaldson, R. S         Conductors         Apr. 2, 1889           400,551         Morton, W. J         Telephones, electric         Apr. 2, 1889           400,600         Rockwell, F. C         Lights, incandescent, special features         Apr. 2, 1889           400,658         Gennert, E. F         Gas setting         Apr. 2, 1889           400,661         Gipperich, A         Galvanometers         Apr. 2, 1889				
400,486         Rice, E. W., jr         Systems of distribution         Apr. 2, 1889           400,492         Rousseau, D         Igniting devices, manual         Apr. 2, 1889           400,515         Thomson, E         Systems of distribution         Apr. 2, 1889           400,520         Tuttle, C. R         Telephones, supports         Apr. 2, 1889           400,523         Van Rysselberghe, F         Telephones, supports         Apr. 2, 1889           400,525         Waddell, W. H         Railway signals         Apr. 2, 1889           400,520         Donaldson, R. S         Conductors         Apr. 2, 1889           400,525         Morton, W. J         Telephones, electric         Apr. 2, 1889           400,591         Morton, W. J         Telephones, electric         Apr. 2, 1889           400,658         Gennert, E. F         Gas setting         Apr. 2, 1889           400,658         Gennert, E. F         Gas setting         Apr. 2, 1889           400,661         Gipperich, A         Galvanometers         Apr. 2, 1889				
400,492       Rousseau, D       Igniting devices, manual       Apr. 2, 1889         400,515       Thomson, E       Systems of distribution       Apr. 2, 1889         400,520       Tuttle, C. R       Telephones, supports       Apr. 2, 1889         400,523       Van Rysselberghe, F       Telegraphy, reed       Apr. 2, 1889         400,525       Waddell, W. H       Railway signals       Apr. 2, 1889         400,552       Donaldson, R. S       Conductors       Apr. 2, 1889         400,591       Morton, W. J       Telephones, electric       Apr. 2, 1889         400,650       Rockwell, F. C       Lights, incandescent, special features       Apr. 2, 1889         400,658       Gennert, E. F       Gas setting       Apr. 2, 1889         400,661       Gipperich, A       Galvanometers       Apr. 2, 1889				
400,516				Apr. 2, 1889
400,520       Tuttle, C. R.       Telephones, supports       Apr. 2, 1889         400,523       Van Rysselberghe, F       Telegraphy, reed       Apr. 2, 1889         400,525       Waddell, W. H       Railway signals       Apr. 2, 1889         400,552       Donaldson, R. S       Conductors       Apr. 2, 1889         400,591       Morton, W. J       Telephones, supports       Apr. 2, 1889         400,600       Rockwell, F. C       Lights, incandescent, special features       Apr. 2, 1889         400,658       Gennert, E. F       Gas setting       Apr. 2, 1889         400,661       Gipperich, A       Galvanometers       Apr. 2, 1889	400,515			
400,523       Van Rysselberghe, F       Telegraphy, reed       Apr. 2, 1889         400,525       Waddell, W. H       Railway signals       Apr. 2, 1889         400,552       Donaldson, R. S       Conductors       Apr. 2, 1889         400,591       Morton, W. J       Telephones, electric       Apr. 2, 1889         400,600       Rockwell, F. C       Lights, incandescent, special features       Apr. 2, 1889         400,658       Gennert, E. F       Gas setting       Apr. 2, 1889         400,661       Gipperich, A       Galvanometers       Apr. 2, 1889				
400,525       Waddell, W. H       Railway signals       Apr. 2, 1889         400,521       Donaldson, R. S       Conductors       Apr. 2, 1889         400,591       Morton, W. J       Telephones, electric       Apr. 2, 1889         400,600       Rockwell, F. C       Lights, incandescent, special features       Apr. 2, 1889         400,658       Gennert, E. F       Gas setting       Apr. 2, 1889         400,661       Gipperich, A       Galvanometers       Apr. 2, 1889				
400,552       Donaldson, R. S       Conductors       Apr. 2, 1889         400,591       Morton, W. J       Telephones, electric       Apr. 2, 1889         400,600       Rockwell, F. C       Lights, incandescent, special features       Apr. 2, 1889         400,658       Gennert, E. F       Gas setting       Apr. 2, 1889         400,661       Gipperich, A       Galvanometers       Apr. 2, 1889				Apr. 2, 1889
400,600       Rockwell, F. C       Lights, incandescent, special features       Apr. 2, 1889         400,658       Gennert, E. F       Gas setting       Apr. 2, 1889         400,661       Gipperich, A       Galvanometers       Apr. 2, 1889	400,552	Donaldson, R. S	Conductors	Apr. 2, 1889
400,658   Gennert, E. F		Morton, W. J	Telephones, electric	Apr. 2, 1889
400,661   Gipperich, A Galvanometers				

No.	Name.	CLASS.	Date.
400,663	Gipperich, A		Apr. 2, 1889
400,664	Hall, C. M	Reducing and separating, aluminium	Apr. 2, 1889
400,665		do	Apr. 2, 1889 Apr. 2, 1889
400,667		do	Apr. 2, 1889
400,669	Hammer, W. J	Cut-outs, thermal	Apr. 2, 1889
400,680		Regulators	Apr. 2, 1889
400,692	Lane, G. M.	Lights, are, gravity feed, gear-clutch Locomotion	
400,724		Locomotiondo	Apr. 2, 1889 Apr. 2, 1889
400,726		Regulators	Apr. 2, 1889
400,732		Cut-outs, mechanical	Apr. 2, 1889
400,733	Bergmann, S	do	Apr. 2, 1889
400,746	Conkling G	Separatorsdo	Apr. 2, 1889 Apr. 2, 1889
400,750	Cox. C. A. and J. F	Annunciators	Apr. 2, 1889 Apr. 2, 1889
400,754	Debonteville, E. D. and Malandin, L. P. C	Air and gas engines, explosive	Apr. 2, 1889
400,764	Greene, P. R	Conductors, underground	Apr. 2, 1889
400,766	Hall, C. M.		Apr. 2, 1889
400,795	Turner, J. A	Electro-magnetsCut-outs, mechanical	
400,809	Van Depoele, C. J		
400,830	Condict, G. H. and Angerer, V	Locomotion	Apr. 2, 1889
400,838	Entz, J. B	Magneto-electric	Apr. 2, 1889
400,842	Griscom, W. W		
400,843 400,862	Lowrie, W. and Hall, C. J		
400,866	Marshall, W		Apr. 2, 1889
400,880	Street, S. T		Apr. 2, 1889
400,890	Bain, F		Apr. 9, 1889
400,911	Hall, P. E		Apr. 9, 1889
400,916	Iwanowski, A. C	Locomotion Thermostats	
400,926	Lundell, R	Locomotion	
400,951	Robinson, M.	Annunciators	Apr. 9, 1889
400,958	Seely, J. A	Conductors, underground	Apr. 9, 1889
400,969 400,971	Thayer, H. B	Telephones, systems	
400,972	Thomson, E	Induction-coils	
400,973	Thomson, E	Magneto-electric	Apr. 9, 1889
400.978	Watts, H. F	Heaters	
400,980	Weston, E Willis, J. B	GalvanometersAnnunciators	
401,006	Carranza, M. and Tinoco, J. M.	Clocks, electric	Apr. 9, 1889
401,014	De Figanière, A	Insulating materials	
401,035	Kaselowsky, E	Telegraphy, circuit closers	
401,041 401,059	Lewin, J. J. Phalan, J. H	Induction-coils Batteries, galvanic	
401,065	Rabe, H	Clocks, electric	
401,067	Reilly, J. C	Telephones, switch-boards	Apr. 9, 1889
401,035	Thomson, E		
401,095 401,120		Lightning rods Lights, filaments and carbons	
401,152	Geary, J	Electro-magnets	Apr. 9, 1889
401,153	Geary, J	Igniting devices, automatic	Apr. 9, 1889
401,154		Conductors, underground	
401,155 401,156		Friction generators.	
401,191		Meters	
401,200	Norris, W. E	Thermostats	Apr. 9, 1889
401,207		Motors, miscellaneous	
401,221		Locomotion	
401,225 $401,226$	Smith, W. F	Metersdo	
401,229	Trapp, E. A		
401,230	Van Depoele, C. J.	Regulators	Apr. 9, 1889
401,231		Motors	
401,244 401,255		Batteries, secondary, applications	
401,255	Griscom, W. W	Cut-outs, mechanical	Apr. 9, 1889
401,289		Batteries, secondary	
401,290	Main, W	do	Apr. 9, 1889
401,291	Main, W	Polls	Apr. 9, 1889 Apr. 9, 1889
401,296 401,304	Russell, C. W. and Drake, J. I	Bells	Apr. 9, 1889
401,317	Weston, E	Magneto-electric	Apr. 9, 1889
401,318	Weston, E	do	Apr. 9, 1889

No.	Name.	CLASS.	DATE.
	TAME,	OHASS.	DAIE.
401,322	Wynne, F	Locomotion	Apr. 9, 1889
401,332	Currie, S. C. C	Batteries, secondary, applications	Apr. 16, 1889
401,334	Delany, P. B	Telegraphy, circuits and systemsAlloys	Apr. 16, 1889 Apr. 16, 1889
401,343	Gildemeyer, C. A	Wire fasteners	Apr. 16, 1889
401,348	Haight, H. J	Thermometers	Apr. 16, 1889
401,366	Osborn, C. V	Induction-coils	
401,394	Walsh, E., jr Benardos, N	Furnaces, accessoriesRheostats	Apr. 16, 1889
401,405 401,409	Brown, A. H	Water distribution, mains and pipes	Apr. 16, 1889
401,414	Conkling, G	Separators	
401,415	Conkling, G	do	
401,417	Cox, C. W. and Van Dyke, T. E	Lights, incandesceut, special features	
401,428 401,444	Gipperich, A Lemp, H. and Wightman, M. J	GalvanometersLights, incandescent	
401,466	Sellon, J. S	Batteries, secondary	Apr. 16, 1889
401,472	Taylor, T	Railway signals	Apr. 16, 1889
401,482	Dewey, M. W.	Heaters	
401,486	Edison, T. A. Johnson, E. H. and Greenfield, E. T.	Lighting systems	
401,498 401,515		Conductors Locomotion	
401,518		Registers	
401,520	Tesla, N	Motors	Apr. 16, 1889
401,521	Walsh, E., jr	Alarms	
401,527	Whitney, E. R.	Air and gas pnmps, mechanical	
401,580 401,582	Packard, J. W	Valve controllers	
401,591	Riesenberg, H	Railway signals	Apr. 16, 1889
401,606	Thompson, E. P	Lights, filaments and carbons	Apr. 16, 1889
401,607	Thompson, E. P	do	Apr. 16, 1889
401,608	Thomson, E		Apr. 16, 1889
401,616 401,617	White, A. C		Apr. 16, 1889 Apr. 16, 1889
401,631	Benedict, G. H. and Fnrlong, P. M	Electrotyping	Apr. 16, 1889
401,632	Billberg, C. O. C	Magneto-electrie	Apr. 16, 1889
401,639	Coffin, Č. L	Heaters	Apr. 16, 1889
401,646 401,664	Edison, T. A	Lights, incandescentRailway signals	Apr. 16, 1889 Apr. 16, 1889
401,668	Weston, E	Magneto-electric	Apr. 16, 1889
401,669	Weston, E	do	Apr. 16, 1889
401,682	Brust, C	Medical and surgical, body-wear	Apr. 16, 1889
401,688 401,721	Coats, C. CSedgwick, F	Separators	Apr. 16, 1889 Apr. 16, 1889
401,732	Candee, W. L.	Telephones, details	Apr. 23, 1889
401,743	Gillett, W	Telephones, electric	Apr. 23, 1889
401,744	Griscom, W. W	Batteries, secondary	Apr. 23, 1889
401,761	Shawhan, J. F	Magueto-electric	Apr. 23, 1889
401,789 401,796	Short, S. H		
401,797	Short, S. H	do	
401,801	Thompson, D. W	Valve eontrollers	Apr. 23, 1889
401,803	Thomson, E	Meters	
401,851 401,882	Parsons, H. W	Medical and surgical, body-wear	Apr. 23, 1889
401,882	Brooks, D., jr	Conductors, nnderground	Apr. 23, 1889
401,936	Egleston, T	Conductors	Apr. 23, 1889
401,953	Kookogey, W. P	Batteries, secondary	Apr. 23, 1889
401,970 402,006	Desmazures C	LocomotionBatteries, secondary	Apr. 23, 1889
402,007	Dewees, T. J	Conductors, underground	Apr. 23, 1889
402,027	Marshall, W	Condensers	Apr. 23, 1889
402,043	Stuart, J. M	Annunciators	Apr. 23, 1889
402,064	Corpor C	Locomotion	Apr. 23, 1889
402,066	Henderson, J. W	Magneto-electric Locomotion	Apr. 23, 1889
402,084	Hnnter, R. M	do	Apr. 23, 1889
402,099	Munier, C. J. A	Telegraphy, printing	Apr. 23, 1889
402,104	Pratt, K. J	Batteries, galvanic	Apr. 23, 1889
402,107 402,108	Ries E E	Heaters ————————————————————————————————————	Apr. 23, 1889
402,103	Van Depoele, C. J	Locomotion	Apr. 23, 1889
402,120	Wilson, J. C	Recorders	Apr. 23, 1889
402,121	Woelk, E. A.	Telephones, switches	Apr. 23, 1889
402,157	Wingoy I	Applications, general	Apr. 30, 1889
402,165 402,166	Kookogev, W. P	BeilsBatteries, galvanic	Apr. 30, 1889
402,190	Prescott, G. B., jr	Batteries, secondary, applications	Apr. 30, 1889
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No.	Name.	Class.	DATE.
402,191	Prescott, G. B., jr	Batteries, secondary, applications	Apr. 30, 1889
402,192	Prescott, G. B., jr	do	Apr. 30, 1889
402,200	Statter, J. G	Magneto-electric	
402,249 402,264	Kimball, J. L. and Wirt, H. C McCluer, C. E	Cut-outs, thermal	
402,204	Yeiser, F		
402,298	Burnley, W	Telegraphy, circuits and systems	
402,311	De Ferranti, S. Z	Locomotion	
402,329	Jansen, A. M. J. and V. J. A. M	Clocks, electric	•Apr. 30, 1889
402,332	Knowlton, D. C	Igniting devices, manual	Apr. 30, 1889
402,347	Patterson, W. R.	Thermostats	Apr. 30, 1889
402,349	Van Dorn, W. L	Batteries, secondary, applications Medical and surgical, body-wear	Apr. 30, 1889
402,367 402,398	Carter, J. T	Railways, automatic signals	
402,408	Crouch, F. J.	Telegraphy, railway-car	
402,410	Davis, D. L	Meters	Apr. 30, 1889
402,414	Dewey, M. W	Telegraphy, automatic	
402,415	Dewey, M. W	do	Apr. 30, 1889
402.416	Dewey, M. W	Heaters	Apr. 30, 1889
402,420	Doubleday, H. M. and R	Lights, incandescent, special features	
402,481	Rockwell, F. C.——————————————————————————————————		Apr. 30, 1889
402,484 402,491	Thomas, B. F	Batteries, secondary	Apr. 30, 1889
402,506	Carter, J. T		
402,507	Chase, S. A	Telegraphy, fire	
402,562	Coleman, J. P	Railway signals	
402,563	Colgate, A. E		
402,565	Cook, G. W	do	May 7, 1889
402,586	Griscom, W. W.	Batteries, secondary	
402,592 402,613	Heaviside, A. W	Conductors, insulators :	
402,626	Smead, B	Annunciators	
402,639	Wilson, J. C	Telegraphy, relays and sounders	
402,642	Young, J.	Telegraphy, fire	
402,671	Hicks, T. H	Systems of distribution	
402,683	Manning, C. E	Advertising, signs	
402,684	Maxim, H. S	Separators	
402,717	Burke, C. G	Telegraphy, relays and sounders Conductors, insulators	
402,752 402,753	Locke, F. M. and Lapp, J Loomis, O. P	Cut-outs, thermal	
402,754	Loomis, O. P	do	
402,779	Steinhoff, A	Valve controllers	
402,810	Denver, W. J.	Anti-induction devices	
402,823	Hammer, E. G.	Clocks, electric	
402,328	Hopkins, G. I	Telegraphy, circuit-closers	
402,829 402,832	Hopkins, G. I	Connectors	
402,536	Jennings, B	do	
402,890	Bemis, S. A. and Pfingst, L	Railway cars, trucks	
402,904	Conkling, G	Separators	May 7, 1889
402,912	Entrikin, J. B	Rheostats	
402,915	Friedländer, A.		
402,928		Recorders	
402,929 402,960	Holcomb, F. A		
402,971	Ries, E. E		
402,986	Shafer, E. B	Telegraphy, fire	
402,990	Silvey, W. L		
403,009	Van Depoele, C. J.	Locomotion	
403,010	Van Depoele, C. J.		
403,011	Van Depoele, C. J.		
403,017 403,018	Wheeler, S. S.	Regulators	
11,002	Noble C. B(Reissue of 374.129)	Lights, arc, gravity feed, clutch	
403,092	Daft, L	Locomotion	May 14, 1889
403,100	Grady, T. H	Time alarms	May 14, 1889
403,104	Hatch, A. A.	Telephones :	May 14, 1889
403,110		· Heaters	
403,157		Pagulators	
403,158 403,164	Watter, H. E	Regulators	May 14, 1889
403,177		Batteries, secondary, applications	
493,180	De Mier, J. R	Railway signals	May 14, 1889
403,192	Hunter, R. M.	Locomotion	May 14, 1889
403,193	Hunter, R. M.	do	May 14, 1889
403,211	Pratt, H. P	Watch cases	May 14, 1889
403,244	Brillié, L	Mcters	May 14, 1889

No.	Name.	CLASS.	DATE.
403,250	Cheever, J. D.	Separators	May 14, 1889
403,253	Collé, C	Batteries, galvanic	
403,256	Eames, H. H	Separators	May 14, 1889
403,258	Field, S. D	Telegraphy, reed	May 14, 1889
403,262 403,267	Garland, E. F	Conductors, anti-inductive	
403,207	Robertson, J. H.	Telephoues, systems	
403,292	Robertson, J. H	Telegraphy, circuits and systems	May 14, 1889
403,308	Thompson, E. P.	Connectors	May 14, 1889
403,311	Weston, E	Galvanometers	
403,312	Weston, E.	do	
403,316 403,345	Adams, S. J Gish, J. L	Telephones, supports	
403,352	Lake, W	Conductors, underground	
403,374	Ries, E. E.	Heaters	May 14, 1889
403,376	Rogers, N. and Wharry, J. A	Air and gas engines, explosive	
403,379	Rogers, N. and Wharry, J. A	do	
403,380	Rogers, N. and Wharry, J. A	Lights applicate and house	
403,397 403,418	Stewart, J	Lights, sockets and keys Conductors, underground	May 14, 1889
403,439	Nickerson, W. E	Applications, tools and machines	May 14, 1889
403,440	Nickerson, W. E	do	May 14, 1889
403,441	Nickerson, W. E	do	May 14, 1889
403,442	Nickerson, W. E	Dettering releasing	
403,451	Barrett, J. A.		
403,458 403,472	Carty, J. J.—————————————————————————————————	Telephones, systems	May 14, 1889 May 14, 1889
403,482	O'Beirne, W. H		May 14, 1889
403,483	O'Connell, J. J.	Telephones, systems	May 14, 1889
403,484	Patterson, W. R.		May 14, 1889
403,487		Magneto-electric	
403,491 403,492	Smith, T. J	InsulatorsInduction-coils	May 14, 1889 May 14, 1889
403,515	Casey, T. A	Railway siguals	
403,517	Cole, F. W		
403,541	Lemp, H	Induction-coils	May 21, 1889
403,549	Orford, J. M	Locomotion	
403,575	Conkling, G		
403,576 403,593	Conkling, G	Batteries, secondary	May 21, 1889
403,619	Steenbergh, G. C	Railway signals	
403,624	Thomas, W. R		
403,626	Van Epps, F. L	Relays and sounders	May 21, 1889
403,630	Willson, T. L		
403,671 403,691	Houghton, D	Lights, arc, positive feed, gear-clutch Applications, tools and machines	May 21, 1889
403,707	Thomson, E	Heaters.	
403,708	Thomson, E	do	May 21, 1889
403,727	Berrang, J. C	Conductors, insulators	May 21, 1889
403,752	Hobbs, J. C.	Reducing and separating	May 21, 1889
403,754	Pope E	Locomotion	May 21, 1889
403,776 403,786	Speed, F. M	Telephones, calls Locomotion	May 21, 1889
403,800	Van Depoele, C. J.	do	May 21, 1889
403,801	Van Depoele, C. J	do	May 21, 1889
403,802	Vetter, J. C.	Batteries, galvanic	May 21, 1889
403,825 403,834	Gilman W H	Music, self-playing instruments	May 21, 1889
403,836	Gravier, A. I.	Regulators	May 21, 1889
403,868	Arnold, D. J	Batteries, galvanic	May 21, 1889
403,905	Blades, H. H	Magneto-electric	May 28, 1889
403,937	Hilkier, C. F	Thermostats	May 28, 1889
403,941 403,944	Knowles, E. K.	Cut-outs, electro-magnetic	May 28, 1889
med to a Made L	Noble C B	Igniting devices, automatic Batteries, galvanic	May 28, 1889
		Batteries, secondary	May 28, 1889
403,955 403,957	Price, J. B	T	Mar 90 1000
403,955 403,957 403,964	Price, J. B	Lights, arc, positive feed	May 20, 1009
403,955 403,957 403,964 403,969	Price, J. B	Locomotion	May 28, 1889
403,955 403,957 403,964 403,969 403,972	Price, J. B	Locomotion	May 28, 1889 May 28, 1889
403,955 403,957 403,964 403,969 403,972 404,015	Price, J. B	Locomotion	May 28, 1889 May 28, 1889 May 28, 1889
403,955 403,957 403,964 403,969 403,972 404,015 404,033	Price, J. B Silvey, W. L Streat, T Sturtevant, T. L Nickerson, W. E Currier, H. L	Locomotion Steam boilers, feeders Applications, tools and machines Telegraphy, circuit-closers	May 28, 1889 May 28, 1889 May 28, 1889 May 28, 1889
403,955 403,957 403,964 403,969 403,972 404,015	Price, J. B Silvey, W. L Streat, T Sturtevant, T. L Nickerson, W. E Currier, H. L Belding, W. S	Locomotion Steam boilers, feeders Applications, tools and machines Telegraphy, circuit-closers Motors	May 28, 1889 May 28, 1889 May 28, 1889 May 28, 1889 May 28, 1889
403,955 403,957 403,964 403,969 403,972 404,015 404,033 404,067 404,068 404,069	Price, J. B	Locomotion Steam boilers, feeders Applications, tools and machines Telegraphy, circuit-closers Motors Magneto-electric Motors	May 28, 1889 May 28, 1889 May 28, 1889 May 28, 1889 May 28, 1889 May 28, 1889 May 28, 1889
403,955 403,957 403,964 403,969 403,972 404,015 404,033 404,067 404,068 404,069 404,112	Price, J. B Silvey, W. L Streat, T Streat, T Sturtevant, T. L Nickerson, W. E Currier, H. L Belding, W. S Belding, W. S Belding, W. S Reinmann, A. L. and Lange, P	Locomotion Steam boilers, feeders	May 28, 1889 May 28, 1889
403,955 403,957 403,964 403,969 403,972 404,015 404,033 404,067 404,068 404,069	Price, J. B Silvey, W. L Streat, T Sturtevant, T. L Nickerson, W. E Currier, H. L Belding, W. S Belding, W. S Belding, W. S Reinmann, A. L. and Lange, P Schmid, A	Locomotion Steam boilers, feeders Applications, tools and machines Telegraphy, circuit-closers Motors Magneto-electric Motors	May 28, 1889 May 28, 1889

No.	Name.	Class.	DATE.
404,120	Stanley, W., jr	Regulators	May 28, 1889
404,139	Westinghouse, G., jr	Locomotion	May 28, 1889
404,149		Tible:	May 28, 1889
404,154 404,165	Burry, J	Lightning arresters Telegraphy, circuits and systems	May 28, 1889 May 28, 1889
404,168	Cameron, H. F. De B. and Harris, T		May 28, 1889
404,170	Coleman, J. P.	Railway signals	May 28, 1889
404,221	Nickerson, W. E		May 28, 1889
404,226 404,232	Robbins, A. C.	Telegraphy, fire————————————————————————————————————	
404,232	Atwood, La M. C.	Lights, arc, positive feed, gear-clutch	May 28, 1889
404,245	Atwood, La M. C	do	May 28, 1889
404,306		Heaters	
404,310		Meters	
404,324		Regulators Locomotion	
404,332	Ball, C. M. and Norton, S	Separators	May 28, 1889
404,333	Ball, C. M. and Norton, S	do	May 28, 1889
404,334	Ball, C. M. and Norton, S	do	May 28, 1889
404,351 404,361	YoFooly R F	Lights, arc, gravity feed, clutch	May 28, 1889
404,301	Dutton, A. L	Applications, tools and machinesSubmarine lamps	
404,426	Oehman, G. T	Telegraphy, printing	
404,438	Ruddick, J. J.	Telegraphy, fire	June 4, 1889
404,441	Shaw, H. F. and G. F.	Locomotion	
404,457 404,463	Wisner, A. J	Railway signalsLights, filaments and carbons	June 4, 1889 June 4, 1889
404,465	Bradley, C. S	Motors	
404,466	Bradley, C. S	do	June 4, 1889
404,469	Cannel, W-		
404,470	Drake, E. S		
404,471 404,484	Hochhausen, W	Telephones, details	June 4, 1889 June 4, 1889
404,507	Shafer, E. B	Transmitters	June 4, 1889
404,518	Chase, S. A.	Telegraphy, fire	
404,519	Chase, S. A.	do	
404,533 404,559	Prior F D	Motors Locomotion	June 4, 1889 June 4, 1889
404,566	Shallenberger, O. B.	Transmission of power	June 4, 1889
404,567	Shallenberger, O. B.	do	June 4, 1889
404,600	Caspersson, C. A	Applications, general	June 4, 1889
404,602 404,630	Clark, E. P Kelly, J. F	RegulatorsInduction-coils	June 4, 1889 June 4, 1889
404,651	Paca, W. S	Motors	
404,661	Slater, H. B	do	June 4, 1889
404,667	Woodhouse, D. A. and Foster, T. V	Applications, tools and machines	June 4, 1889
404,680	Brown, C. W		
404,682 404.687	Cabell, S. G	Aging liquors Locomotion	
404,698	Frishmuth, W	Batteries, galvanic	June 4, 1889
404,699	Frishmuth, W.	do	June 4, 1889
404,712	Kester, J. F	Magneto-electric	June 4, 1889
404,713 404,714	Kester J F	do	June 4, 1889
404,715	Kester, J. F	do	June 4, 1889
404,745	Taylor, E. C	Dentistry, miscellaneous	June 4, 1889
404,783	Gartner, A	Regulators	June 4, 1889
404,801 404,813		Meters Connectors	
404,816		Lights, incandescent	
404,822		Induction-coils	June 11, 1889
404,850	Littlehales, G. H	Phonographs	June 11, 1889
404,859		Regulators	
404,860 404,861	Pfannkuche, G	Galvanometersdo	June 11, 1889 June 11, 1889
404,866	Ricketson, J. C.	Indicators	June 11, 1889
404,867	Ricketson, J. C.	do	June 11, 1889
404,873	Short, S. H		June 11, 1889
404,877		Conductors, underground	June 11, 1889 June 11, 1889
404,894		Applications, tools and machines	June 11, 1889
404,895		do	June 11, 1889
404,902	Edison, T. A	Conductors	June 11, 1889
404,906		Clocks, electric	June 11, 1889 June 11, 1889
404,913 404,959	Crowell, L. C	Printing, rotary	June 11, 1889
404,968	Griscom, W. W.	Batteries, secondary, applications	

No.	Name.	CLASS.	DATE.
404,986	Rudolfy, J	Inhalers and respirators	June 11, 1889
405,002	Bishop, W. S	Magneto-electric	June 11, 1889
405,010	Byrne, J. E	Valve-controllers	
405,045	Mowrer, M. L	Separators	
405,089	Gerry, J. HSchmid, A	Clocks, electric	June 11, 1889
405,124 $405,126$	Shaw, N. H	Applications, general Igniting devices	June 11, 1889 June 11, 1889
405,151	Easton, L. F	Thermostats	June 11, 1889
405,170	Maxim, H. S	Lights, filaments and carbons	June 11, 1889
405,174	Pfannkuche, G	Regulators	June 11, 1889
405,176	Pratt, H. P.	Medical and surgical, body-wear	June 11, 1889
405,187	Sperry, E. A.	Drills	June 11, 1889
405,188 405,194	Sperry, E. A	Mining machines	
405,196	Barrett, J. A.	Batteries, galvanic	
405,206	Dubinski, B	Time alarms	
405,211	Haskins, C. D	Telegraphy, quadruplex	June 11, 1889
405,213	Hicks, T. H	Batteries, secondary	
405,218	Loomis, O. P	Regulators	
405,221 405,223	McKivítt, W. E Perret, F. A	Telephones, systems	
405,235	Wilson, J. C	Telegraphy, fire	
405,239	Maxim, H. S	Lights, filaments and carbons	
405,246	Childs, W. A	Batteries, galvanic	June 18, 1889
405,248	Dahl, O	Cut-outs, mechanical	June 18, 1889
405,249	Dahl, O	Meters	
405,263 405,284	Lemp, H	Regulators Magneto-electric	
405,334	Waite, H. E	Friction generators	
405,345	Coffin, C. L	Heaters	
405,365	Lineff; A. L	Locomotion	
405,382	Stromberg, A	Telephones, switches	
405,399	Diehl, R. and P	Meters	
405,420	Konigslow, H		
405,427 $405,436$	Melaney, W. H	Medical and surgical, body-wear	
405,440	Sperry, E. A.	Lights, arc, gravity feed, clutch	
405,441	Sperry, E. A.	Magneto-electric	
405,452	Yale, C. O	Electro-deposition	June 18, 1889
405,461	Burbank, H. L.	Telephones, systems	
405,468	Flad, H	Locomotion	
$\frac{405,471}{405,480}$	Hughes, T. V. and Chambers, C. R.	Magneto-electric Lights, filaments and carbons	June 18, 1889 June 18, 1889
405,507	Sandwell, W. D.	Magneto-electric	June 18, 1889
405,515	Warde, G. H		June 18, 1889
405,519	Wuerpel, M	Railway signals	June 18, 1889
405,525	Braun, C. A	Telegraphy, circuit-closers	June 18, 1889
405,539	Dewey, M. W	Telegraphy, automatic	June 18, 1889
405,544 405,546	Fisher, F. E Trist, R. P		June 18, 1889 June 18, 1889
405,556		Locomotion	June 18, 1889
405,566	Konigslow, O	Telephones, supports	June 18, 1889
405,572	Loomis, O. P	Lighting systems	June 18, 1889
405,576	Lynch, J.	Conductors, underground	June 18, 1889
405,602 $405,604$	Revelle A	Magneto-electricElectrolysis	June 18, 1889
405,609	Serson, J	Batteries, galvanic	June 18, 1889 June 18, 1889
405,621	Taylor, C. W	Telegraphy, keys	June 18, 1889
405,626	Van Depoele, C. J.	Locomotion	June 18, 1889
405,627	Van Depoele, C. J.	do	June 18, 1889
405,628		Diagram do	June 18, 1889
405,646 $405,647$	Zalinski, E. L. and Smith, H. J. Zalinski, E. L. and Smith, H. J.		June 18, 1889 June 18, 1889
405,668	Hunter, R. M.		
405,677	Pickernell, F. A		June 18, 1889
405,684	Smith, H. J. and Zalinski, E. L.	Blasting fuses	June 18, 1889
405,733	Griscom, W. W		
405,742	Orford, J. M.		
405,743 405,750	Robertson, J. H		June 25, 1889
405,751	Van Gestel, J. T		
405,767	Brewer, W. J		
405,815	White, J. C	Railway signals	June 25, 1889
405,824	Bottome, T. D	Chlorination	June 25, 1889
405,831	Dewey, M. W.	Telegraphy, fire	
405,858 405,859	Tesla, N	Motors Transmission of nower	June 25, 1889
405,859	Tesla, N	Transmission of power	June 25, 1

#### NUMERICAL INDEX-ELECTRICITY.

No.	Name.	CLASS.	DATE.
405,867 405,895 405,896 405,906 405,964 405,970 405,984 405,985 405,986 405,988 405,989 405,989 405,989 405,989	Burke, C. G	Batteries, secondary, applications Lights, arc, positive feed, gear-clutch Car brakes Lights, incandescent, special features Locomotion Telegraphy, automatic Telegraphy, circuits and systems Telegraphy, automatic Relays and soundersdododo Metal working, miscellaneous Meters	June 25, 1889



# APPENDIX No. VIII.

#### PART III.

CONSISTING OF A

# ALPHABETICAL INDEX OF ALL PATENTS

RELATING TO

# ELECTRICITY

Issued from July 1. 1888, to June 30, 1889, inclusive, giving names of Inventors, numbers and dates of Patents, and the sub-class to which each belongs.



### ALPHABETICAL INDEX

OF

# PATENTS RELATING TO ELECTRICITY

From July 1, 1888, to June 30, 1889.

No.	NAME.	Class.	DATE.
	·	•	
390,196	Acheson, E. G	Applications, general	Oct. 2, 1888
400,283	Adams, H. R	Time checks	Mar. 26, 1889
385,436	Adams, J. S. and Morrell, A. W	Lights, sockets and keys	July 3, 1888
391,351	Adams, J. S	Cut-outs, mechanical	Oct. 16, 1888
403,316	Adams, S. J	Telephones, supports	May 14, 1889
390,741	Adams, T. E	Conductors, insulators	Oct. 9, 1888
388,008	Ader, C		Aug. 21, 1888
400,724	Ainslie, D. A	Locomotion	Apr. 2, 1889
400,725	Ainslie, D. A	do	Apr. 2, 1889
404,149	Ainslie, D. A		May 28, 1889
392,772	Allen, O		Nov. 13, 1888
405,978	Allen, R. N		June 25, 1889
395,682	Ambler, A. I	Car brakes	Jan. 8, 1889
385,900	Amet, E. H	Recorders	July 10, 1888
387,842	Amet, E. H	do	
391,831	Amet, E. H		
392,531	Amet, E. H	Recorders Cut-outs, mechanical	Nov. 6, 1888
397,826	Andrews, A. E	Galvanometers	
387,131 389,352	Anthony, W. A	Motors	
396,385	Arthony, W. A	Telegraphy, fire, alarms and extinguishers	Sept. 11, 1888 Jan. 22, 1889
403,868	Arnold, D. J	Batteries, galvanic	May 21, 1889
396,847	Ashen, P	Insulators	Jan. 29, 1889
389,186	Askew, C. B. and Pumpelly, J. K	Batteries, secondary	Sept. 11, 1888
393,348	Atkins, C. H	Separators	Nov. 27, 1888
404,244	Atwood, La M. C	Lights, arc, positive feed, gear-clutch	May 28, 1889
404,245	Atwood, La M. C	do	May 28, 1889
404,816	Backstrom, C. A.	Lights, incandescent	June 11, 1889
394,807	Bacon, A. H	Medical and surgical, body-wear	Dec. 18, 1888
395,028	Bailey, M. and Warner, J.	Batteries, galvanic	Dec. 25, 1888
392,301	Bailey, R. M		Nov. 6, 1888
400,890	Bain, F		Apr. 9, 1889
389,187	Baldwin, J. W		Sept. 11, 1888
398,926	Balet, J. W	Regulators	
398,927	Balet, J. W	do	Mar. 5, 1889
399,646	Balet, J. W	Magneto-electric	Mar. 19, 1889
400,726	Balet, J. W	Regulators	Apr. 2, 1889
404,332	Ball, C. M. and Norton, S	Separators	May 28, 1889
404,333	Ball, C. M. and Norton, S	do	May 28, 1889
404,334	Ball, C. M. and Norton, S	do	May 28, 1889
394,951	Balsley, U. H.	Telephones, systems	Dec. 25, 1888
395,201	Barber, A. M. and Gabriel, C	Belt shifters	Dec. 25, 1888
338,333	Barnard, W. T	Telegraphy, reed	Aug. 21, 1888
395,111	Barnes, W. A	Telegraphy, fire, alarms and extinguishers	Dec. 25, 1888
395,112	Barnes, W. A	Tolophonos ologtrio	Dec. 25, 1888
388,242 390,833	Barney, W. C Barrett, A. and Zentner, J	Annunciators	
392,775	Barrett, J. A.		Nov 13 1888
397,331	Barrett, J. A.		Feb 5 1889
403,451	Barrett, J. A		May 14, 1889
405,196		do	June 11, 1889
393,203	Bartley, L. C.	do	Nov. 20, 1888
401,244		Connectors	
394,049		Time checks	
388,753	Batley, J.	Motors	Aug. 28, 1888
388,244	Baudot, J. M. E	Telegraphy, printing	Aug. 21, 1888
394,952	Baxter, W., jr	Applications, tools and machines	Dec. 25, 1888
405,867	Beach, F. G	Telephones, systems	June 25, 1889
388,335	Beattie, J., ir	Batteries, secondary	Aug. 21, 1888
394,810	Beattie, J., ir	Batteries, galvanic	Dec. 18, 1888
396,723	Beers, C. B	Magnetic locks and bolts	Jan. 29, 1889
394,905	Belding, W. S	Magneto-electric	Dec. 18, 1888

No.	NAME.	CLASS,	DATE.	
395,260	Belding, W. S.	Magneto-electric	Dec. 25, 1888	
404,067	Belding, W. S	Motors	May 28, 1889	
404,068	Belding, W. S.	Magneto-electric	May 28, 1889	
404,069 386,796	Belding, W. S. Belfield, R.	Motors ————————————————————————————————————	May 28, 1889 July 31, 1888	
386,797	Belfield, R	do	July 31, 1888	
386,956	Belfield, R	Lights, systems	July 31, 1888	
392,400	Belfield, R	Applications, general	Nov. 6, 1888	
10,986 404,154	Belfield, R(Reis. of 392,400.) Belfield, R	Lightning arresters	Feb. 19, 1889 May 28, 1889	
402,890	Bemis, S. A. and Pfingst, L	Railway cars, trucks	May 7, 1889	
388,245	Benardos, N	Heaters	Aug. 21, 1888	
388,246	Benardos, N	do	Aug. 21, 1888	
401,405 401,631	Benardos, N	RheostatsElectrotyping	Apr. 16, 1889	
399,474	Benjamin, F. P.			
390,642	Bennett, J. B	Telegraphy, keys	Oct. 9, 1888	
385,787		Locomotion		
385,902 385,903	Bentley, E. M	do	July 10, 1888 July 10, 1888	
389,278	Bentley, E. M	do	Sept. 11, 1888	
389,279	Bentley, E. M.	do	Sept. 11, 1888	
400,038	Bentley, E. M.	do	Mar. 26, 1889	
400,179 400,180	Bentley, E. M.	do	Mar. 26, 1889 Mar. 26, 1889	
400,180	Bentley, E. M	do	Mar. 26, 1889	
400,182	Bentley, E. M.	do	Mar. 26, 1889	
391,010	Bentz, H		Oct. 16, 1888	
385,539 389,280	Bergman, E. F Bergmann, S	Cut-outs, mechanical	July 3, 1888 Sept. 11, 1888	
392,843	Bergmann, S.	Telephones, supports	Nov. 13, 1888	
395,116	Bergmann, S.	Rheostats	Dec. 25, 1888	
397,218	Bergmann, S.	Lights, incandescent, special features	Feb. 5, 1889	
398,121 400,732	Bergmann, S.	RheostatsCut-outs, mechanical	Feb. 19, 1889 Apr. 2, 1889	
400,733	Bergmann, S.	do	Apr. 2, 1889	
390,058	Bernheim, E. I	Telephones, calls	35 05 2002	
403,727	Berrang, J. C Bickley, C. G	Insulators		
389,356 392,660	Bidwell, B.	Batteries, secondary, applications		
401,632	Billberg, C. O. C	do	Apr. 16, 1889	
392,490	Billings, C. E	do	Nov. 6, 1888	
398,122 389,870	Birdsall, E. T Bishop, J. D		Feb. 19, 1889 Sept. 25, 1888	
405,002	Bishop, W. S	Magneto-electric	June 11, 1889	
388,247	Blackwell, J. L	Locomotion	Aug. 21, 1888	
389,189	Blackwell, J. L	do	Sept. 11, 1888	
389,281 389,282	Blackwell, J. L Blackwell, J. L		Sept. 11, 1888 Sept. 11, 1888	
396,725	Blades, H. H	Regulators	Jan. 29, 1889	
397,773	Blades, H. H	do	Feb. 12, 1889	
399,822		Motors.	Mar. 19, 1889	
403,905 391,224	Blair, J. B	Magneto-electric Magneto-electric, hand-machines	Oct. 16, 1888	
399,236		Locomotion		
399,732		do		
392,403	Blake, F			
395,476 398,814		Telephones, electric		
385,694	Blaszkaye, J	Fire brick	July 10, 1888	
386,449	Bliss, E. N. and Middleton, J. F	Cameras	July 24, 1888	
397,270 386,103		Railway signals		
401,120		Lights, filaments and carbons		
404,463	Bottome, T. D	do	June 4, 1889	
405,824	Bottome, T. D	Chlorination	June 25, 1889	
395,207 390,062	Bowles R C M	Insulators Telephones, mechanical	Dec. 25, 1888 Sept. 25, 1888	
398,577	Bowmau, A. H. and Widdifield, W. P	Car brakes	Feb. 26, 1889	
390,439	Bradley, C. S	Magneto-electric	Oct. 2, 1888	
394,818	Bradley, C. S	do	Dec. 18, 1888	
394,819 399,372	Bradley, C. S.	Locomotion	Mar. 12, 1889	
404,465	Bradley, C. S	Motors	June 4, 1889	
404,466	Bradley, C. S	do	June 4, 1889	
387,044 390,440	Brady T H	Lamp shadesdodo	Oct. 2 1888	
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No.	Name.	CLASS.	DATE.	
900 100	Dander II II	Locomotion	E-b 98 1999	
398,489 388,622		Clocks, electric		
399,128	Brainerd, F. W	do	Mar. 5, 1889	
395,609	Brangs, P. H.	Cut-outs, mechanical	Jan. 1, 1888	
405,525 385,839	Braun, C. A	Circuit-closers Telephones, mechanical	June 18, 1889 July 10, 1888	
394,638	Brevoort, H. L. and Roberts, I. L	Batteries, galvanie	Dec. 18, 1888	
390,748	Brewer, H. J	do	Oct. 9, 1888	
391,505	Brewer, H. J	do	Oct. 23, 1888	
393,353 405.767	Brewer, W. J.	Locomotion	Nov. 27, 1888 June 25, 1889	
388,177	Bridewell, R. F	Lighting devices	Aug. 21, 1888	
398,222		Locomotion	Feb. 19, 1889	
403,244 396,325	Brillié, L		May 14, 1889	
399,826	Brooks, A. A	Conductors		
401,927	Brooks, D. Jr	Conductors, underground	Apr. 23, 1889	
401,409	Brown, A. H	Water distribution, mains and pipes		
386,685 386,380	Brown, C. E. L Brown, C. W	Magneto-electric		
393,612	Brown, C. W	Telephones, systems		
404,680	Brown, C. W	Telephones, supports		
404,822 387,615	Brown, F. H. Brown, H. P.	Induction-coils		
390,001	Brown, L. W	Towers		
398,025	Brown, W. C.	Conductors, insulators	Feb. 19, 1889	
391,114	Brush, C. F	Regulators	Oct. 16, 1888	
395,377 395,378	Brush, C. F	Batteries, secondary, applications		
395,379	Brush, C. F	do		
396,681	Brush, C. F	do		
401,682 391,943	Brust, C	Medical and surgical, body-wear		
387,853	Buckingham, C. L. and Lemp, H	Regulators		
394,095	Buckingham, C. L	Magneto-electric	Dec. 4, 1888	
403,177	Buell, Č. E	Batteries, secondary, applications		
386,767 390,113	Bulen, G. F Bullough, J	Applications, general	July 24, 1888 Sept. 25, 1888	
400,050	Bunker, Í. S	Annunciators		
405,461	Burbank, H. L.	Telephones, systems		
399,375 402,717	Burden, J. A	Separators ————————————————————————————————————	Mar. 12, 1889	
405,984	Burke, C. G	Telegraphy, automatic	June 25, 1889	
405,985	Burke, C. G	Telegraphy, circuits and systems	June 25, 1889	
405,986	Burke, C. G			
405,987 405,988	Burke, C. G			
405,989	Burke, C. G	do	June 25, 1889	
397,965	Burnley, W.	Batteries, galvanic	Feb. 19, 1889	
399,314 402,298	Burnley, W.	Telegraphy, circuits and systemsdo	Mar. 12, 1889	
388,757	Burns, J.	Lights, filaments and carbons	Aug. 28, 1888	
393,814	Bnrns, P. C	Batteries, galvanic	Dec. 4, 1888	
404,165 397,109	Bussmann, O. S	Telegraphy, circuits and systems Cut-outs, mechanical	Feb. 5 1889	
391,229	Bntler, H. W	Batteries, secondary	Oct. 16, 1888	
399,016	Butterworth, A. W	Telephones, mechanical	Mar. 5, 1889	
390,281 404,893	Butz, A. M	Applications, tools and machines	Oct. 2, 1888	
404,894		Apprecations, tools and machines		
404,895	Byrne, J. E	do	June 11, 1889	
405,010	Byrne, J. E.	Valve-controllers	June 11, 1889	
404,682 396,983	Cade, B	Aging liquorsTelegraphy, railway-car	Jan. 29, 1889	
397,049	Cade, B	Railway signals	Jan. 29, 1889	
394.332	Cadwallader, B	Applications, general	Dec. 11, 1888	
397,221 395,311		Conductors, underground Batteries, secondary		
404,168	Cameron, H. F. De B. and Harris, T			
392,103	Campbell, H. F	Conductors, anti-inductive	Oct. 30, 1888	
401,732 399,738	Cannan J. J.	Telephones, detailsTelegraphy, fire, alarms and extinguishers	Apr. 23, 1889 Mar 19 1889	
404,469		Locomotion		
395,950	Capek, J. V	Heaters	Jan. 8, 1889	
396,645	Carox G. H. and Magarthur W.	MetersRelays and sounders	Jan. 22, 1889 Jan. 22, 1889	
396,465 397,966	Carey, W. A	Galvanometers	Feb. 19, 1889	
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No.	Name.	Class.	DATE.
387,049	Carr, R. L. and Borden, P	Batteries, galvanic	July 31, 1888
388,628	Carr, R. L. and Borden, P	do	Aug. 28, 1888
401,006	Carranza, M. and Finoco, J. M.	Clocks, electric	Apr. 9, 1889
402,398	Carter, J. T	Railways, automatic signals	Apr. 30, 1889
402,506 399,377	Carter, J. T	Railway signals Anti-induction devices	Mar 19 1880
403,458	Carty, J. J.	Telephones, systems	
394,832	Casey, J. F	do	
394,833	Casey, J. F	do	Dec. 18, 1888
403,515	Casey, T. A	Railway signals	May 21, 1889
388,181	Cassard, H	Batteries, galvanic	Aug. 21, 1888
404,600	Caspersson, C. A	Applications, general	
399,497 397,830	Cassidy, J. C	Lights, incandescent, special features————————————————————————————————————	Mar. 12, 1889 Feb. 12, 1889
396,920	Chamberlain, J. C	Cut-outs, thermal	
389,196	Chase, H. A		
389,197	Chase, H. A	Motors	Sept. 11, 1888
392,664	Chase, H. A	Locomotion	
400,300	Chase, H. A	do	
388,631	Chase, S. A	Telegraphy, firedodo	Aug. 28, 1888
402,507 404,518		do	
404,519		do	
403,250		Separators	
387,051	Cheney, F. A	Lightning arresters	July 31, 1888
386,184	Chescbrough, R. A	Locomotion	July 17, 1888
405,246	Childs, W. A	Batteries, galvanic	June 18, 1889
394,153	Chisholm, D. J	Drop lights and hangers	
390,067 402,064	Chisholm, I. WChristy, W	Galvanometers	
387,145	Clamer, F. J	Incrustation	_ 1 , / ,
387,146	Clamer, F. J	do	
397,489	Clamer, F. J. and Hendrickson, J. G	Batteries, galvanic	
404,602	Clark, E. P	Regulators	
386,238	Clarke, F. E	Telephones, mechanical	
387,969	Clark, F. E	do	
394,555 394,834	Clark, W. C. Cleeve, H. F. and Parker, J.	AnnunciatorsSoda-water apparatus	
391,512	Cleveland, W. B	Cut-outs, mechanical	
392,665	Cleverly, H. A	Igniting devices	
392,666	Coad, T	Lights, sockets and keys	Nov. 13, 1888
395,769	Coad, T	Batteries, galvanic	Jan. 8, 1889
401,688	Coats, C. C	Separators	Apr. 16, 1889
396,543	Cobb, H. B		
392,855 395,421	Cookburn, E. B		
396,269	Cockburn, A. C		
402,066	Coerper, C		Apr. 23, 1889
395,878		Heaters	
396,270		do	
399,019		do	Mar. 5, 1889
401,639		do	
405,345 397,340		Magneto-electric	
397,111		Batteries, galvanic	
400,304	Colby, E. J	Annunciators	Mar. 26, 1889
403,825	. Cole, C. B	Conductors, underground	May 21, 1889
403,517	Cole, F. W	Electro-magnets	May 21, 1889
386,965	Coleman T D	Telephones, electric	July 31, 1888
395,315 402,562	Coleman, J. P.	Railway signals	Jan. 1, 1889 May 7, 1889
404,170		do	
402,563		Conductors, underground	
403,418	Colgate, A. E	do	May 14, 1889
403,253	Collé, C	Batteries, galvanic	May 14, 1889
394,958	Colling, S	Medical and surgical, body-wear	Dec. 25, 1888
393,741	Collins, W. C		
393,742 391,356	Collins, W. C.		
389,638	Conant. T. P		
394,642	Conant, T. P		
393,323	Condict, G. H		
399,599	Condict, G. H	do	Mar. 12, 1889
400,830	Condict, G. H. and Angerer, V	do	Apr. 2, 1889
400,746	Conkling G	Separatorsdo	Apr. 2, 1889
400,747 $401,414$	Conkling, G	do	Apr. 16 1889
101,111			pr. 10, 1000

No.	Name.	CLASS.	DATE.		
401,415	Conkling, G	Separators	Apr. 16, 1889		
402,904	Conkling, G	do	May 7, 1889		
403,575	Conkling, G	do			
403,576 391,783	Conkling, G	Thermostats	May 21, 1889		
397,537	Conner, E. G	Knitting and netting, stopping			
388,477	Conner, W. A	Conductors			
395,546	Conner, W. A	do			
402,565	Cook, G. W	Conductors, underground			
385,846 393,887	Cook, J. A.	Telephoues, switch-boards————————————————————————————————————			
400,750	Cox, C. A. and J. F	Annunciators	Apr. 2, 1889		
401,417	Cox, C. W. and Van Dyke, T. E	Lights, incandescent, special features	Apr. 16, 1889		
389,640 393,422	Cox, H. B	Induction-coils	Sept. 18, 1888		
397,418	Crandall, J. E	Telegraphy, lightning arresters	Feb. 5, 1889		
388,836	Crane, M. G	Bells			
400,308	Cranmer, W. C. and Aruold, S. W		Mar. 26, 1889		
388,837 387,343	Crockett, C. H. and Allen, C. C	Annunciators Magneto-electric			
397,171	Crosby, E. H	Telegraphy, fire, alarms and extinguishers	Aug. 7, 1888 Feb. 5, 1889		
400,430	Crosby, E. H.	Batteries, galvanic	Apr. 2, 1889		
397,969	Cross, E. D		Feb. 19, 1889		
398,132 402,408	Cross, E. D Cronch, F. J		Feb. 19, 1889 Apr. 30, 1889		
404,959	Crowell, L. C		June 11, 1889		
391,517	Cuff, J. E	Conductors	Oct. 23, 1888		
393,744	Currie, S. C. C	Batteries, secondary, applications	Dec. 4, 1888		
394,100 398,769	Currie, S. C. C	Connectors	Dec. 4, 1888 Feb. 26, 1889		
400,395	Currie, S. C. C	Batteries, secondary, applications			
401,255	Corrie, S. C. C	do			
401,332	Currie, S. C. C	do	Apr. 16, 1889		
398,314 404,033	Currier, H. L	Valve controllers			
388,023	Curry, F. P.	Signals, automatic	Aug. 21, 1888		
386,111	Cutler, H. H	Conductors, insulators	July 17, 1888		
397,538	Cutler, H. H	Meters			
386,059 393,745	Cuttriss, C	Telegraphy, automatic Magneto-electric	July 10, 1888 Dec. 4, 1888		
385,915	Daft, L	Locomotion	July 10, 1888		
388,538	Daft, L	do	Aug. 28, 1888		
388,955 394,062	Daft, L	do	Sept. 4, 1888 Dec. 4, 1888		
396,195	Daft, L	Magneto-electric	Dec. 4, 1888 Jan. 15, 1889		
396,196	Daft, L	Locomotion	Jan. 15, 1889		
403,092	Daft, L	do	May 14, 1889		
404,470	Daft, L	Galvanometers	June 4, 1889 June 4, 1889		
398,498	Dahl, O	do	Feb. 26, 1889		
405,248	Dahl, O	Cut-outs, mechanical	June 18, 1889		
405,249	Dahl, O	Meters	June 18, 1889		
391,587 393,622	Dallas, M	Conductors, underground————————————————————————————————————	Oct. 23, 1888 Nov. 27, 1888		
396,649	Davidson, W	Railways, turn-tables	Jan. 22, 1889		
395,215	Davies, D. H. and Tourtel, J. M.	Lighting systems	Dec. 25, 1888		
402,410	Davis, F.	Meters	Apr. 30, 1889		
386,772 391,839	Davis, E	Telegraphy, fire————————————————————————————————————	July 24, 1888 Oct. 30, 1888		
400,311	Davis, E. H. and Westervelt, R	Motors	Mar. 26, 1889		
400,312	Davis, E. H. and Westervelt, R	Thermostats	Mar. 26, 1889		
389,448 394,680	Day, S. A.——————————————————————————————————	Primers Drop-lights and hangers	Sept. 11, 1888 Dec. 18, 1888		
396,146	Dean, G. H	Lamp shades	Jan. 15, 1889		
398,133	De Baun, S	Medical and surgical, body-wear	Feb. 19, 1889		
400,754	Debonteville, E. D. and Malandin, L. P. C	Air and gas engines, explosive	Apr. 2, 1889		
389,795 389,838	De Ferranti, S. Z	Systems of distribution Induction-coils	Sept. 18, 1888 Sept. 18, 1888		
394,837	De Ferranti, S. Z	Connectors	Dec. 18, 1888		
394,838	De Ferranti, S. Z	do	Dec. 18, 1888		
402,311 401,014	De Ferranti, S. Z				
386,189	De Figanière, A Delany, P. B	Insulating materials			
388,481	Delany, P. B.	Telephones, circuits and systems	Aug. 28, 1888		
389,062	Delany, P. B.	do	Sept. 4, 1888		
390,115 395,427	Delany, P. B.	GalvanometersTelegraphy, automatic	Jan. 1, 1889		
000,521	Detaily, I. Desired	Loregraphy, automatic	1, 1000		

No.   NAME   Class   DATE				
103,180   De Mirr, J. R.   Railway signals   May 14, 1858   384,889   Denio, W. L.   Telegraphy, circ, altarms and extinguishers   Dec. 18, 1858   387,288   Denio, W. L.   Telegraphy, circ, altarms and extinguishers   Dec. 18, 1858   387,288   Denio, W. L.   Telegraphy, circ, altarms and extinguishers   Dec. 18, 1858   387,280   De Redon, C. F   Railway signals   July 10, 1858   385,290   De Redon, C. F   Railway signals   July 10, 1858   385,290   De Redon, C. F   Vending apparatus   Feb. 19, 1859   402,000   Desnazures, C.   Batteries, secondary   Apr. 23, 1859   385,290   Desnazures, C.   Batteries, secondary   Apr. 23, 1859   385,290   Desnazures, C.   Batteries, secondary   Apr. 23, 1859   385,290   Desnazures, C.   Batteries, secondary   Apr. 23, 1859   385,201   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   385,613   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   385,613   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   385,613   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   385,613   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   385,613   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   385,613   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   401,182   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   401,182   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   401,182   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic	No.	Name.	· Class.	DATE
103,180   De Mirr, J. R.   Railway signals   May 14, 1858   384,889   Denio, W. L.   Telegraphy, circ, altarms and extinguishers   Dec. 18, 1858   387,288   Denio, W. L.   Telegraphy, circ, altarms and extinguishers   Dec. 18, 1858   387,288   Denio, W. L.   Telegraphy, circ, altarms and extinguishers   Dec. 18, 1858   387,280   De Redon, C. F   Railway signals   July 10, 1858   385,290   De Redon, C. F   Railway signals   July 10, 1858   385,290   De Redon, C. F   Vending apparatus   Feb. 19, 1859   402,000   Desnazures, C.   Batteries, secondary   Apr. 23, 1859   385,290   Desnazures, C.   Batteries, secondary   Apr. 23, 1859   385,290   Desnazures, C.   Batteries, secondary   Apr. 23, 1859   385,290   Desnazures, C.   Batteries, secondary   Apr. 23, 1859   385,201   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   385,613   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   385,613   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   385,613   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   385,613   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   385,613   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   385,613   Devey, M. W   Telegraphy, circuits and systems   Dec. 25, 1858   401,182   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   401,182   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   401,182   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic   Apr. 30, 1859   405,313   Devey, M. W   Telegraphy, automatic				
2014   2015   2016	401,334	Delany, P. B		Apr. 16, 1889
2877.83   Denio, W. L.   Telegraphy, circuit-closers   Feb. 12, 1859   3877,022   Deniver, W. J.   Telephones, nati-induction devices   May 7, 1859   3870,025   Deniver, W. J.   Telephones, nati-induction devices   May 7, 1859   3870,025   Deniver, W. J.   Telephones, nati-induction devices   May 7, 1859   3870,025   Deniver, W. J.   Telephones, nati-induction devices   May 7, 1859   3870,025   Deniver, W. J.   Telephones, nati-induction devices   May 7, 1859   3870,025   Deniver, W. J.   Telephones, deal and surgical, buths   Feb. 19, 1859   Per. 19			Railway signals	
Motors		Denio W L		
402,810   Denver W. J		Denison, J. F	Motors	
Section   Sect	402,810	Denver, W. J	Telephones, anti-induction devices	May 7, 1889
Materials   Mate		De Redon, C. F.	Wending appearatus	
288,282   De Vars, H. A. B. H.   Medical and surgical, baths   Feb. 19, 1859   294,000   Dewey, M. W.   Telegraphy, automatic   Dec. 25, 1888   384,001   Dewey, M. W.   Telegraphy, productions and systems   Dec. 25, 1888   385,012   Dewey, M. W.   Telegraphy, productions and systems   Dec. 25, 1888   385,013   Dewey, M. W.   Telegraphy, productions   Jan. 1, 1889   385,013   Dewey, M. W.   Telegraphy, productions   Jan. 1, 1889   385,013   Dewey, M. W.   Telegraphy, minding   Jan. 8, 1889   385,059   Dewey, M. W.   Telegraphy, minding   Jan. 8, 1889   401,142   Dewey, M. W.   Telegraphy, minding   Jan. 8, 1889   401,142   Dewey, M. W.   Telegraphy, automatic   Apr. 16, 1829   402,4141   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   402,4141   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30, 1859   405,535   Dewey, M. W.   Telegraphy, automatic   Apr. 30,		Desmazures C		
402,007   Dewees, T. J.		De Vars, H. A. B. H		
394,601   Dewey M. W	402,007	Dewees, T. J	Conductors, underground	
395,613 Dewcy, M. W Telegraphy, rede. Jan. 1, 1859 395,915 Dewcy, M. W Telegraphy, printing Jan. 1, 1859 395,935 Dewcy, M. W Telegraphy, printing Jan. 1, 1859 396,733 Dewcy, M. W Telegraphy, printing Jan. 2, 1859 396,733 Dewcy, M. W Telegraphy, multiplex Jan. 28, 1859 406,415 Dewcy, M. W Telegraphy, automatic Apr. 26, 1859 406,415 Dewcy, M. W Telegraphy, automatic Apr. 26, 1859 405,235 Dewcy, M. W Telegraphy, automatic Jan. 28, 1859 405,235 Dewcy, M. W Telegraphy, automatic June 18, 1859 405,831 Dewcy, M. W Telegraphy, automatic June 18, 1859 383,844 Dey, C. E Annunciators Agr. 26, 1859 396,629 D'Humy, P. R. De F Batteries, galvanic Jan. 15, 1859 396,649 Dickerson, E. N., ir Systems of distribution Jan. 22, 1859 385,645 Diehl, P Tempering and aunealing, applications Aug. 28, 1858 385,645 Diehl, P Tempering and aunealing, applications Aug. 28, 1858 385,645 Diehl, R. and P Meters June 18, 1859 385,645 Diehl, R		Dewey, M. W		
395,614 Dewey, M. W  Telegraphy, printing  Jan. 1, 1829 395,939 Dewey, M. W  Telegraphy, multiplex  Jan. 29, 1839 401,482 Dewey, M. W  Telegraphy, multiplex  Jan. 29, 1839 401,482 Dewey, M. W  Telegraphy, multiplex  Apr. 16, 1839 402,414 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 402,415 Dewey, M. W  Heaters  Apr. 16, 1839 402,415 Dewey, M. W  Heaters  Apr. 30, 1839 405,439 Dewey, M. W  Heaters  Apr. 30, 1839 405,439 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 405,439 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 405,439 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 405,439 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 405,439 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 405,439 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 405,439 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 405,439 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 405,439 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 405,439 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 405,439 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 405,439 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 405,439 Dewey, M. W  Telegraphy, automatic  Apr. 30, 1839 406,450 Demelorate, M. A.		Dewey, M. W	Telegraphy, circuits and systems	
Telegraphy, fire		Dewey, M. W	Telegraphy, printing	
396,741   Dewey, M. W		Dewey, M. W	Telegraphy, fire	
Heaters		Dewey, M. W		
402,414   Dewey, M. W		Dewey, M. W		
doc.,416   Dewey, M. W		Dewey, M. W		
405,581   Dewey, M. W		Dewey, M. W		
405,831   Dewey, M. W		Dewey, M. W		
388,344   Dev, Č. E				
396,549   Dickerson, E. N., jr   Systems of distribution   Jan. 22, 1889   389,856   Diehl, P   Motors   Sept. 25, 1888   389,857   Diehl, R. and P   Motors   June 18, 1889   399,134   Dillon, L. W   Cut-outs, nechanical   Mar. 5, 1839   399,134   Dillon, L. W   Cut-outs, nechanical   Mar. 5, 1839   399,134   Dillon, L. W   Cut-outs, nechanical   Mar. 5, 1839   399,134   Dillon, L. W   Cut-outs, nechanical   Mar. 5, 1839   399,135   Dillon, L. W   Cut-outs, nechanical   Mar. 5, 1839   399,765   Doriot, C   Motors   Sept. 18, 1888   404,471   Drake, E. S.   Telephones, details   June 4, 1839   404,471   Drake, E. S.   Telephones, details   June 4, 1839   400,535   Dobbie, R. S   Regulators   Mar. 26, 1839   400,535   Dobbie, R. S   Regulators   Mar. 26, 1839   400,535   Dobbie, R. S   Conductors   Apr. 2, 1839   400,535   Dobbie, R. S   Conductors   Apr. 30, 1839   Apr. 30, 1839   Dobbie, R. S   Conductors   Apr. 30, 1839   Apr. 30, 1	388,344	Dev. C. E	Annunciators	
Sas, 45		D'Humy, P. R. De F		
Sept. 25, 1888   Advertising signs   Sept. 25, 1888   Sept. 28, 1888   S				
495,399				
399,134   Dillon, L. W	405,399	Diehl, R. and P.	Meters	June 18, 1889
399,155   Dillon, L. W.		Dieuleveult, U	Telegraphy, circuits and systems	
Motors				
404,471   Drake, E. S		Doriot, C		
400,315			Telephones, details	June 4, 1889
400,552   Donaldson, R.S   Conductors   Apr. 2, 1889   389,839   Dubinski, B				
Sept. 18, 1888   Dublinski, B				
402,420   Doubleday, H. M. and R			Telegraphy, fire	
Sept. 18, 1888   Sept. 18, 1889   Sept. 18, 18, 18, 18, 18, 18, 18, 18, 18, 18,		Doubleday, H. M. and R	Lights, incandescent, special features	
391,590   Dovle, J.		Downing, W. W.		
1, 1889				
Telegraphy, fire.   Aug. 7, 1888   399,505   Dudley, W. J.   Telephones, calls   Mar. 12, 1889   399,320   Du Laney, G. L.   Magneto-cleetrie   Mar. 12, 1889   394,161   Dulles, W., jr   Locomotion   Dec. 11, 1888   394,471   Duncan, L.   Batteries, secondary   Dec. 11, 1888   394,472   Duncan, L.   do   Dec. 11, 1888   394,473   Duncan, L.   do   Dec. 11, 1888   394,473   Duncan, L.   do   Dec. 11, 1888   394,474   Duncan, L.   do   Dec. 11, 1888   394,475   Duncan, L.   do   Dec. 11, 1888   394,474   Duncan, L.   do   Dec. 11, 1888   394,474   Duncan, L.   do   Dec. 11, 1888   394,575   D'Unger, R.   Telephones, electric   Oct. 2, 1888   394,575   D'Unger, R.   Telephones, systems   Dec. 18, 1888   393,625   Durieux, C.   Applications, general   Nov. 27, 1888   393,625   Durieux, C.   Applications, general   Nov. 27, 1888   394,562   Dutton, A. L.   Submarine lamps   June 4, 1889   394,562   Dutton, C. N.   Oscillating meters   Dec. 18, 1883   396,585   Dyer, I. T.   Magneto-electric   Jau. 15, 1889   395,961   Dyer, R. N.   Doemotion   Jan. 8, 1889   391,360   Eames, H. H.   Reducing and separating   Oct. 16, 1888   391,360   Eames, H. H.   Reducing and separating   Oct. 16, 1888   391,360   Eames, H. H.   Separators   May 14, 1889   394,563   Easton, L. F.   Thermostats   Dec. 18, 1888   394	395,317	Dubey, E. A	Advertising, signs	
Telephones, calls				
Magneto-cleetrie   Mar. 12, 1889   394,161   Dulles, W., jr   Locomotion   Dec. 11, 1888   394,472   Duncan, L   Batteries, secondary   Dec. 11, 1888   394,473   Duncan, L   do   Dec. 11, 1888   394,474   Duncan, L   do   Dec. 11, 1888   394,474   Duncan, L   do   Dec. 11, 1888   394,475   Duncan, L   do   Dec. 11, 1888   394,476   Duncan, L   do   Dec. 11, 1888   394,575   D'Unger, R   Telephones, electric   Oct. 2, 1888   393,624   Durieux, C   Applications, general   Nov. 27, 1888   393,625   Durieux, C   do   Nov. 27, 1888   394,562   Dutton, A. L   Submarine lamps   June 4, 1889   394,562   Dutton, C. N   Oscillating meters   Dec. 18, 1888   396,355   Dyer, R. N   Locomotion   Jan. 15, 1889   399,137   Dyer, R. N   Locomotion   Jan. 8, 1889   399,137   Dyer, R. N   Locomotion   Jan. 8, 1889   391,034   Eames, H. H   Reducing and separating   Oct. 16, 1888   403,256   Eames, H. H   Reducing and separating   Oct. 16, 1888   403,256   Eames, H. H   Electrolysis   Oct. 16, 1888   403,256   Easton, L. F   Thermostats   Dec. 18, 1888   394,563   Easton, L. F   Thermostats   Dec. 18, 1889   394,563   Easton, L. F   Dec. 18, 1888   391,594   Eaton, A. K   Batteries, galvanic   July 3, 1888   391,594   Eaton, A. K   Batteries, galvanic   July 3, 1888   391,594   Eddy, A. H   Outors   Oct. 23, 1888   391,594   Eddy, A. H   Outors   Oct. 24, 1888   391,594   Eddy, A. H   Outors   Oct. 23, 1888   391,594   Eddy, A. H   Outors   Oct. 24, 1888   391,594   Eddy, A. H   Outors   Oct. 24, 1888   391,594   Eddy, A. H   Outors   Oct. 24, 1888   Oct. 25, 1888   Oct. 2			Telegraphy, fire	
Dulles, W., jr			Magneto-cleetrie	
394,473   Duncan, L	394,161	Dulles, W., jr	Locomotion	Dec. 11, 1888
394,473   Duucan, L				
394,474   Duncan, L.				
394,914   Durant, G. F. aud Bailey, H. L				
393,624   Durieux, C		D'Unger, R	Telephones, electric	Oct. 2, 1888
393,625   Durieux, C		Durieux C	Applications general	
404,390         Dutton, A. L.         Submarine lamps         June 4, 1889           394,562         Dutton, C. N.         Oscillating meters         Dec. 18, 1889           395,355         Dyer, I. T.         Magueto-electric         Jau. 15, 1889           395,961         Dyer, R. N.         Locomotion         Jan. 8, 1889           399,137         Dyer, R. N.         do         Mar. 5, 1889           391,034         Eames, H. H.         Reducing and separating         Oct. 16, 1888           391,360         Eames, H. H.         Electrolysis         Oct. 16, 1888           394,563         Eames, H. H.         Separators         May 14, 1889           394,564         Easton, L. F.         Thermostats         Dec. 18, 1888           405,151         Easton, L. F.         do         June 11, 1889           389,207         Eastwick, A. E         Motors         Sept. 11, 1888           385,344         Eaton, A. K         Batteries, galvanic         July 3, 1888           389,1592         Eddy, A. H         Galvanometers         Oct. 23, 1888           391,593         Eddy, A. H         Motors         Oct. 23, 1888           391,594         Eddy, A. H         Motors         Mar. 12, 1889           396,507		Durieux, C	do	Nov. 27, 1888
396,355         Dyer, I. T.         Magueto-electric         Jau. 15, 1889           395,961         Dyer, R. N         Locomotion         Jan. 8, 1889           399,137         Dyer, R. N         do         Mar. 5, 1889           391,034         Eames, H. H         Reducing and separating         Oct. 16, 1888           391,360         Eames, H. H         Electrolysis         Oct. 16, 1888           403,256         Eames, H. H         Separators         May 14, 1889           394,563         Easton, L. F         do         June 11, 1889           389,207         Eastwick, A. E         Motors         Sept. 11, 1888           389,344         Eaton, A. K         Batteries, galvanic         July 3, 1888           389,140         Eaton, A. K         Batteries, galvanic         July 3, 1888           391,592         Eddy, A. H         Galvanometers         Oct. 23, 1888           391,593         Eddy, A. H         Motors         Oct. 23, 1888           391,594         Eddy, A. H         Motors         Oct. 23, 1888           390,507         Eddy, A. H         Motors         Mar. 12, 1889           396,974         Edison, T. A         Phonographs         July 31, 1888           386,974         Edison, T. A	404,390	Dutton, A. L	Submarine lamps	June 4, 1889
395,961   Dyer, R. N		Dutton, C. N	Oscillating meters	Dec. 18, 1883
399,137   Dyer, R. N		Dyer, R. N	Locomotion	Jan. 8, 1889
391,034         Eames, H. H.         Reducing and separating         Oct. 16, 1888           391,360         Eames, H. H.         Electrolysis         Oct. 16, 1888           403,256         Eames, H. H.         Separators         May 14, 1889           394,563         Easton, L. F.         Thermostats         Dec. 18, 1888           405,151         Easton, L. F.         do         June 11, 1889           389,207         Eastwick, A. E         Motors         Sept. 11, 1888           385,344         Eaton, A. K         Batteries, galvanic         July 3, 1888           389,140         Eaton, A. K         Galvanometers         Oct. 23, 1888           391,592         Eddy, A. H         Motors         Oct. 23, 1888           391,593         Eddy, A. H         Motors         Oct. 23, 1888           390,507         Eddy, A. H         Motors         Mar. 12, 1889           396,974         Edison, T. A         Phonographs         July 31, 1888           389,369         Edison, T. A         Lights, incandescent         Sept. 11, 1888	399,137	Dyer, R. N	do	Mar. 5, 1889
403,256       Eames, H. H.       Separators       May 14, 1889         394,563       Easton, L. F.       Thermostats       Dec. 18, 1888         405,151       Easton, L. F.       do       June 11, 1889         S89,207       Eastwick, A. E       Motors       Sept. 11, 1888         385,344       Eaton, A. K       Batteries, galvanic       July 3, 1888         389,140       Eaton, A. K       do       Sept. 4, 1888         391,592       Eddy, A. H       Galvanometers       Oct. 23, 1888         391,593       Eddy, A. H       Motors       Oct. 23, 1888         391,594       Eddy, A. H       Cut-outs, thermal       Oct. 23, 1888         399,507       Eddy, A. H       Motors       Mar. 12, 1889         399,507       Edison, T. A       Phonographs       July 31, 1888         389,369       Edison, T. A       Lights, incandescent       Sept. 11, 1888		Eames, H. H.	Reducing and separating	Oct. 16, 1888
394,563         Easton, L. F-         Thermostats         Dec. 18, 1888           405,151         Easton, L. F-         do         June 11, 1889           389,207         Eastwick, A. E         Motors         Sept. 11, 1889           385,344         Eaton, A. K         Batteries, galvanic         July 3, 1888           389,140         Eaton, A. K         do         Sept. 4, 1888           391,592         Eddy, A. H         Galvanometers         Oct. 23, 1888           391,593         Eddy, A. H         Motors         Oct. 23, 1888           391,594         Eddy, A. H         Cut-outs, thermal         Oct. 23, 1888           399,507         Eddy, A. H         Motors         Mar. 12, 1889           386,974         Edison, T. A         Phonographs         July 31, 1888           389,369         Edison, T. A         Lights, incandescent         Sept. 11, 1889		Eames H H	Separators	May 14 1888
405,151   Easton, L. F		Easton, L. F	Thermostats	Dec. 18, 1888
385,344       Eaton, A. K       Batteries, galvanic       July 3, 1888         389,140       Eaton, A. K       do       Sept. 4, 1888         391,592       Eddy, A. H       Galvanometers       Oct. 23, 1888         391,593       Eddy, A. H       Motors       Oct. 23, 1888         391,594       Eddy, A. H       Cut-outs, thermal       Oct. 23, 1888         391,595       Eddy, A. H       Motors       Mar. 12, 1889         399,507       Eddy, A. H       Motors       Mar. 12, 1889         386,974       Edison, T. A       Phonographs       July 31, 1888         389,369       Edison, T. A       Lights, incandescent       Sept. 11, 1888	405,151	Easton, L. F	do	June 11, 1889
389,140       Eaton, A. K      do       Sept. 4, 1888         391,592       Eddy, A. II       Galvanometers       Oct. 23, 1888         391,593       Eddy, A. H       Motors       Oct. 23, 1888         391,594       Eddy, A. H       Cut-outs, thermal       Oct. 23, 1888         399,507       Eddy, A. H       Motors       Mar. 12, 1889         386,974       Edison, T. A       Phonographs       July 31, 1888         389,369       Edison, T. A       Lights, incandescent       Sept. 11, 1888				
391,592       Eddy, A. H       Galvanometers       Oct. 23, 1888         391,593       Eddy, A. H       Motors       Oct. 23, 1888         391,594       Eddy, A. H       Cut-outs, thermal       Oct. 23, 1888         399,507       Eddy, A. H       Motors       Mar. 12, 1889         386,974       Edison, T. A       Phonographs       July 31, 1888         389,369       Edison, T. A       Lights, incandescent       Sept. 11, 1888				
391,593       Eddy, A. H       Motors       Oct. 23, 1888         391,594       Eddy, A. H       Cut-outs, thermal       Oct. 23, 1888         399,507       Eddy, A. H       Motors       Mar. 12, 1889         386,974       Edison, T. A       Phonographs       July 31, 1888         389,369       Edison, T. A       Lights, incandescent       Sept. 11, 1888				
399,507       Eddy, A. H       Motors       Mar. 12, 1889         386,974       Edison, T. A       Phonographs       July 31, 1888         389,369       Edison, T. A       Lights, incandescent       Sept. 11, 1888	391,593	Eddy, A. H	Motors	Oct. 23, 1888
386,974       Edison, T. A.       Phonographs       July 31, 1888         389,369       Edison, T. A.       Lights, incandescent       Sept. 11, 1888				
389,369   Edison, T. A   Lights, incandescent   Sept. 11, 1888				
390,462 Edison, T. A. Lights, filaments and carbons Oct. 2, 1888	389,369	Edison, T. A.	Lights, incandescent	Sept. 11, 1888
	390,462	Edison, T. A.	Lights, filaments and carbons	Oct. 2, 1888

No.	NAME.	CLASS.	DATE.
391,595	Edison, T. A	Systems of distribution	Oct. 23, 1888
391,596	Edison, T. A		Oct. 23, 1888
395,123	Edison, T. A	Magneto-electric	Dec. 25, 1888
395,962 395,963	Edison, T. A		Jan. 8, 1889
396,356	Edison, T. A	Lights, filaments and carbons	Jan. 8, 1889 Jan. 15, 1889
397,705	Edison, T. A	Magneto-electric	Feb. 12, 1889
398,774	Edison, T. A	Lights, incandescent	Feb. 26, 1889
400,317	Edison, T. A	Separators.	
401,486   401,646	Edison, T. A	Lighting systems Lights, incandescent	
404.902	Edison, T. A	Conductors	
390,463	Edmunds, H		
390,464	Edmunds, H		
393,146 393,147	Edmunds, H	do	
400,198	Edwards, E. A		Mar. 26, 1889
397,116	Egan, C. E	Batteries, galvanie	
399,748	Egan, C. E		Mar. 19, 1889
401,936	Egleston, T		Apr. 23, 1889
396,149 397,492	Eickemeyer, R	Magneto-electricdodo	
388,482	Eisenhart, C. A	Induction-coils	
388,960	Ellinger, J. O	Metal-working, miscellaneous	Sept. 4, 1888
389,455	Elliott, R. M	Batteries, secondary	Sept. 11, 1888
395,773 392,018	Emerson, E.	Electro-deposition Galvanometers	Jan. 8, 1889 Oct. 30, 1888
385,664	Emmer, J., jr	Telephones, electric	July 3, 1888
390,955	Emmner, J., jr	Magneto-electric	Oct. 9, 1888
386,580	Enos, J. A	Batteries, secondary	July 24, 1888
386,581	Enos, J. A	Locomotion	July 24, 1888
398,713 402,912	Enos, J. A Entrikin, J. B	IndicatorsRheostats	Feb. 26, 1889 May 7, 1889
400,838	Entz, J. B	Magneto-electric	Apr. 2, 1889
390,354	Epplé, L	Medical and surgical, body-wear	Oct. 2, 1888
389,799	Estabrook, W. W	Applications, general	Sept. 18, 1888
385,701	Euphrat, É	Rails	July 10, 1888
386,919 387,347	Everitt, P	Applications, generalAmalgamators, electric	July 31, 1888 Aug. 7, 1888
394,164	Farmer, J. S	Telegraphy, circuit closers	Dec. 11, 1888
392,724	Farnham, I. H	Cut-outs, electro-magnetic	Nov. 13, 1888
394,964	Farnham, I. H	Telephones, switch-boards	Dec. 25, 1888
401,338 389,882	Farr, H. G	AlloysBatteries, secondary	Apr. 16, 1889
393,325	Faure, C. A. Favre, J. C. J. C	Spring scales	Sept. 25, 1888 Nov. 20, 1888
397,790	Fear, F	Medical and surgical, body-wear	Feb. 12, 1889
397,176	Ferdinand, A. B.	Telephones, calls	Feb. 5, 1889
387,286	Fewson, H	Sewage and night-soil	
389,883 391,954	Field, S. D	Telegraphy, automaticRegulators	
392.914	Field, S. D		Nov. 13, 1888
393,224	Field, S. D	Locomotion	Nov. 20, 1888
395,556	Field, S. D.	Telegraphy, multiplex	Jan. 1, 1889
403,258 393,749	Field, S. D.	Telegraphy, reed	Dec 4 1889
405,544	Fisher, F. E		
387,714		Motors	Aug. 14, 1888
389,142	Fiske, B. A	Telegraphy, printing	Sept. 4, 1888
396,199	Fiske, B. A		
387,679 405,468	Fitch, D. H		June 18, 1880
393,823	Flotron, E. and De La Bastie, F. B. A. R.	Conductors, underground	Dec. 4, 1888
387,505	Forbes, G.	Meters	Aug. 7, 1888
404,351	Fox, J. R		May 28, 1889
392,114 393,751	France I P	Systems of distribution	Dec. 4 1898
393,752		Certuroid do do	Dec. 4, 1888
393,636	Freeman, W. P	Magneto-electric	Nov. 27, 1888
402,915	Friedländer, A	Batteries, galvanic	May 7, 1889
404,698		do	
404,699 405,546	Frist R P	Conductors	June 4, 1889 June 18, 1889
386,775	Fritsche, W	Magneto-electric	July 24, 1888
390,768	Ganse, H. D	Type-witting	Oct. 5, 1000
	Galvin, J. A	Lighting systems Telephones, mechanical	Feb. 19, 1889 Aug. 14, 1888

No.	NAME.	CLASS.	DATE.	
395,492	Gartner, A	Regulators	Jan. 1, 1889	
404,533	Gartner, A	Motors	June 4, 1889	
385,705	Gaston, J. E	Lights, arc, positive feed	July 10, 1888	
404,783 398,144	Gartner, A Geary, J	RegulatorsAlarms, burglar	June 4, 1889 Feb. 19, 1889	
401,152	Geary, J	Electro-magnets	Apr. 9, 1889	
401,153	Geary, J	Igniting devices, automatic	Apr. 9, 1889	
400,658	Gennert, E. F	Gas setting	Apr. 2, 1889	
393,637	Gerry, J. H	Clocks, clectric		
405,089 393,639	Gerry, J. H	Batteries, galvanic		
388,668	Gibson, C. D. P	Batteries, secondary	Aug. 28, 1888	
397,796	Gibson, C. D. P	do	Feb. 12, 1889	
401,343	Gildemeyer, C. A	Wire fasteners		
399,192 401,743	Gill, O. Â	Sack scales Telephones, electric		
401,154	Gillette, G. H. and K. C	Conductors, underground		
401,155	Gillette, G. H. and K. C	do		
402,157	Gilman, C C	Applications, general		
403,834	Gilman, W. H	Music, self-playing instruments		
396,334 400,325	Gilson, S. H Ginochio, N. B	Insulators Telephones, magnetic		
400,326	Ginochio, N. B	Telephones, calls		
400,327	Ginochio, N. B.	Magneto-electric, hand-machines-	Mar. 26, 1889	
400,661	Gipperich, A	Galvanometers	Apr. 2, 1889	
400,662	Gipperich, A	do	Apr. 2, 1889	
400,663	Gipperich, A	do		
403,345	Gish, J. L	Rheostats		
395,130	Given, J. L	Railways, pneumatic:	Dec. 25, 1888	
401,156	Gläser, H.	Friction generators		
405,471 396,557	Gleeson, T	Magneto-electric		
393,824	Goodridge, W. M.	Magneto-clectric, hand-machines Telephones, switch boards	Dec. 4. 1888	
392,326	Gould, C. C	Telephones, systems		
403,100	Grady, T. H	Time alarms		
386,463 391,364	Grah, E	Valve controllers Medical and surgical, body-wear		
396,867	Grant, P	Regulators		
403,836	Gravier, A. I	do	May 21, 1889	
386,814	Gray, E	Telegraphy, automatic		
386,815 394,172	Gray, E	Magneto-electric, hand-machines		
399,876	Graydon, J. W			
399,879	Graydou, J. W	do		
399,881	Graydon, J. W	Shells	Mar. 19, 1889	
397,423 386,314	Greaves, J.	Applications, general	Feb. 5, 1889 July 17, 1888	
388,859	Greeu, G. F	Locomotion	Sept. 4, 1888	
390,293	Green, G. F	Railways, deadening noise	Oct. 2, 1888	
400,764 386,066	Gridley F I	Conductors, underground	Apr. 2, 1889	
394,173	Griffith, A. and Burbank, H. A	Telephones, switches	Dec. 11, 1888	
397,284	Griffith, A. and Burbank, H. A	Telephones, calls	Feb. 5, 1889	
393,431	Griggs, A. C	Railway signals	Nov. 27, 1888	
399,326 401,882	Griggs, A. C.	Medical and surgical, body-wear	Mar. 12, 1889	
389,297	Griscom W W	Lighting, systems	Apr. 25, 1669 Sept. 11, 1888	
391,468	Griscom, W. W	Batteries, secondary, applications	Oct. 23, 1888	
393,365	Griscom, W. W	Cut-outs, mechanical	Nov. 27, 1888	
393,469	Griscom, W. W	Magneto-electric	Nov. 27, 1888	
393,470 393,755	Griscom W. W	Batteries, secondary, applications Metal working, miscellaneous	Dec. 4 1888	
393,756		Systems of distribution		
393,757	Griscom, W. W	Batteries, secondary, applications	Dec. 4, 1888	
394,485	Griscom, W. W	Cut-outs, electro-magnetic	Dec. 11, 1888	
394,568 400,842	Griscom, W. W	Cut-outs, mechanical	Dec. 18, 1888	
400,842	Griscom, W. W	batteries, secondarydo	Apr. 2, 1889	
401,270	Griscom, W. W	Cut-outs, mechanical	Apr. 9, 1889	
401,744	Griscom, W. W	Batteries, secondary	Apr. 23, 1889	
402,586	Griscom, W. W	Dettain and an intime	May 7, 1889	
404,968 405,733	Griscom W W	Batteries, secondary, applications Metal working, miscellaneous	June 11, 1889 June 25, 1889	
405,796	Griscom, W. W	do	June 25, 1889	
397,424	Griscom, W. W. and Weidner, H. N.	Connectors	Feb. 5, 1889	
388,862	Griswold, H. P.	Steering and propulsion	Sept. 4, 1888	

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388,357	Guest, J. H	Telegraphy, fire, alarms and extinguishers	Aug. 21, 1888
388,358	Guest, J. H	Telegraphy, fire	Aug. 21, 1888
387,160 397,461	Guntz, G	Motors———————————————————————————————————	July 31, 1888 Feb. 5, 1889
397,910	Gutmann, L	do	Feb. 19, 1889
404,906	Hadlock, W. E	Clocks	June 11, 1889
401,348 396,155	Haight, H. J.——————————————————————————————————	Piano attachments	Apr. 16, 1889 Jan. 15, 1889
396,156	Hale, F. W	Exercising devices	Jan. 15, 1889
392,604	Hale, G. C., Barrett, A. and Zentner, J.	Telegraphy, fire	Nov. 13, 1888
393,828 386,980	Hall, A. E	Applications, general	Dec. 4, 1888
400,664	Hall, C. M	Reducing and separating, aluminium	July 31, 1888 Apr. 2, 1889
400,665	Hall, C. M	do	Apr. 2, 1889
400,666	Hall, C. M	do	Apr. 2, 1889
400.667	Hall, C. M	do	Apr. 2, 1889 Apr. 2, 1889
391,605	Hall, E. J	Conductors	Oct. 23, 1888
400,911	Hall, P. E	Telephones, supports	Apr. 9, 1889
402,823 397,715	Hammer, E. G	Cut-outs, mechanical	May 7, 1889 Feb. 12, 1889
400,669	Hammer, W. J.	Cut-outs, thermal	Apr. 2, 1889
385,458	Harding, A	Magneto-electric	July 3, 1888
393,558 388,487	Harms, C. F	Telegraphy, circuit-closers	
391,319	Harris, L. S.	Regulators	
390,778	Harris, P. A	Telegraphy, circuit-closers	Oct. 9, 1888
394.648	Harris, T. W	Railways, traction, underground	
387,718 399,400	Harvey, W. B.	Telephones, supportsCut-outs, electro-magnetic	Aug. 14, 1888 Mar. 12, 1889
405,211	Haskins, C. D.	Telegraphy, quadruplex	June 11, 1889
393,304	Haskins, C. H.	Igniting devices	
400,209 403,104	Haskins, D. G.——————————————————————————————————	Hydraulic motors, rotary Telephones, calls	
394,978	Hauss, D. J	Magneto-electric	Dec. 25, 1888
398,613	Hayden, H., jr. and Desant, W. F. Z	Railway signals	
395,137 395,974	Hayes, H. V	Telephones, systems	
399,328	Hayes, J. A.	Magneto-electric	
385,927	Hazell, J. W.	Applications, general	July 10, 1888
385,928 398,614	Heald, E. W	Telegraphy, dynamo	July 10, 1888 Feb. 26, 1889
402,592	Heaviside, A. W	Insulators	May 7, 1889
393.704	Heimann, S	Lamp chimneys	Nov. 27, 1888
403,267 396,870	Heimann, S Heinrichs, C. F	ConductorsBatteries, galvanic	May 14, 1889 Jan. 29, 1889
396,871	Heinrichs, C. F	do	Jan. 29, 1889
392,513	Heisler, C	Systems of distribution	
394,180 390,229	Heisler, C	Cut-outs, mechanicalSeparators	
402,080	Henderson, J. W	Locomotion	Apr. 23, 1889
396,207		Railway signals	
393,644 398,045	Hermite, E., Paterson, E. J. and Cooper, C. F.	Insulating materials Paper-making, bleaching	Feb. 19, 1889
357,876	Héroult, P	Reducing and separating, aluminium	Aug. 14, 1888
392,953	Herrington, G. H	Phonographs	Nov. 13, 1888
390,597 387,642		Batteries, galvanic	
387,643	Hewett, E. M	do	Aug. 14, 1888
388,415	Hewins, E. H	Shaft couplings	Aug. 28, 1888
387,974 385,413	Hexamer, C. J. Heysinger, I. W.	Clocks, electric Locomotion	Aug. 14, 1888
389,888	Heysinger, I. W	Lights, sockets and keys	
391,792	Heysinger, I. W.	Locomotion	Oct. 30, 1888
391,793 398,963	Heysinger, I. W	do	
392,863	Heywood, B	do	
399,329	Heywood, B	Magneto-electric	Mar. 12, 1889
389,812 399,534	Hicks, T. H.	Systems of distribution	Sept. 18, 1888 Mar. 12, 1889
402,671	Hicks, T. H	do	
405,213	Hicks, T. H.	Batteries, secondary	June 11, 1889
398,833 399,401	Higgins, F. H. W	Telegraphy, printingRegulators	Mar. 5, 1889 Mar. 12, 1889
399,401	Higham, D	do	Mar. 12, 1889
399,403	Higham, D	Magneto-electric	Mar. 12, 1889
399,404	Higham, D	do	Mar. 12, 1889

No.	Name.	CLASS.	DATE.
400,680	Higham, D	Regulators	Apr. 2, 1889
403,937	Hilkier, C. F	Thermostats	May 28, 1889
388,869	Hill, H. T	Telegraphy, railway-car	Sept. 4, 1888
390,301	Hill, W. S	Magneto-electric	Oct. 2, 1888
398,510	Hill, W. S	Cut-outs, mechanical	Feb. 26, 1889
391,969 399,666	Himmer, V Hitehcock, C. A	Clocks, electric	Oct. 30, 1888 Mar. 19, 1889
403,752	Hobbs, J. C	Reducing and separating	May 21, 1889
404.484	Hochhausen, W	Magneto-electric	
390,230	Hoefling, C. E	Clocks, electric	Oct. 2, 1888
396,086	Hoffmann, C	Magneto-electric	
397,548	Hoffmann, C. G	Telethermometers	
389,151 385,556	Hogan, G. L Hoke, C. U	Igniting devices Medical and surgical, body-wear	Sept. 4, 1888 July 3, 1888
397,364	Holcombe, A. G	Annunciators	
402,928	Holcomb, F. A	Recorders	
402,929	Holcomb, F. A	Telegraphy, transmitters	
395,781	Hollerith, H	Indicators	Jan. 8, 1889
395,782	Hollerith, H		
395,783	Holler W. A. and Malin W.		
397,594 396,932	Holley, W. A. and Malin, W		
399,228	Hopkins, G. I	Telegraphy, railway-car	
402,828	Hopkins, G. I	Telegraphy, circuit-closers	May 7, 1889
402,829	Hopkins, G. I	Connectors	May 7, 1889
400,214	Horne, W. L	Lights, systems and appliances	Mar. 26, 1889
386,129	Hotchkiss, Z. P	Telegraphy, transmitters	July 17, 1888
403,472	Hotelskiss, Z. P	Telegraphy, printing	May 14, 1889
403,671 386,322	Houghton, D		May 21, 1889 July 17, 1888
394,925	Hoyt, A. J	Telegraphy, circuit-closers	Dec. 18, 1888
399,535	Huber, J. L.	Batteries, secondary	Mar. 12, 1889
405,480	Hughes, T. V. and Chambers, C. R	Lights, filaments and carbons	June 18, 1889
396,933	Hulford, W. J	Refrigerators	Jan. 29, 1889
399,331	Hull, W. S. and Anderson, J. C.	Railway signals	Mar. 12, 1889
386,071	Humans, W	Magueto-electric, hand-machines	July 10, 1888 Sept. 4, 1888
388,876 388,877	Humans, W	Magneto-electric, hand-machines	Sept. 4, 1888
389,080	Humans, W.	Bells	Sept. 4, 1888
390,674	Humphreys, D	Batteries, galvanic	Oct. 9, 1888
390,675	Humphreys, D	do	Oct. 9, 1888
390,676	Humphreys, D	do	Oct. 9, 1888
390,677	Humphreys, D	Locomotion	Oct. 9, 1888 July 3, 1888
385,672 392,675	Hunter, R. M	do	
397,235	Hunter, R. M	Batteries, secondary	Feb. 5, 1889
397,550	Hunter, R. M	Magneto-clectric	Feb. 12, 1889
397,857	Hunter, R. M	Heaters	Feb. 12, 1889
398,402		Locomotion	
399,409 400,404		Pottorios vocandows	
400,916	Hunter R. M	Batteries, secondary Locomotion	Apr 9 1889
402,084	Hunter, R. M	do	Apr. 23, 1889
402,832	Hunter, R. M	do	May 7, 1889
403,192		do	
403,193		do	
403,754 405,556		do	
405,668		Motors-	
391,797	Hyer, W. E	do	Oct. 30, 1888
400,215	Imschenetzky, A	Batteries, galvanie	Mar. 26, 1889
390,081	Inghram, A. G	Railways, signals	Sept. 25, 1888
393,237	Irving, J. I	Station indicators	Nov. 20, 1888
389,226	Irwin, J	Railways, signals	Sept. 11, 1888
386,541 400,917	Iwanowski A C	Telegraphy, railway car Thermostats	Apr 0 1880
396,403		Meters	
392,033	Jacques, W. W.	Telephones, systems	Oct. 30, 1888
386,403	James, J. W	Safety cars	July 17, 1888
398,731	James, J. W	Medical and surgical, baths	Feb. 26, 1889
403,593	Jamieson, A	Batteries, secondary	May 21, 1889
394,697 402,329	Jansen A M J and V I A M	Telegraphy, relays and soundersClocks, electric	Dec. 18, 1888
386,543	Jarman, A. J.	Locomotion	Apr. 50, 1669 July 24 1888
395,703	Jenkins, W. F	do	Jan. 8, 1889
395,442	Jennings, B	do	Jan. 1, 1889
402,836	Jennings, B	do	May 7, 1889

No.	Name,	CLASS.	DATE.
386,073	Jewell, O. H	Purifying water	July 10 1999
404,913	Johns, H. W., jr	Conductors	
394,491	Johns, J. H.	Alarms	
386,828	Johnson, C. W	Thermostats	July 31, 1888
393,473	Johnson, E. H		Nov. 27, 1888
401,498	Johnson, E. H. and Greenfield, E. T	Conductors	Apr. 16, 1889
403,110	Johnson, G. B. and M		May 14, 1889
392,034 390,481	Johnson, W. A	Cut-outs, mechanical	
397,806	Johnson, W. G	Medical and surgical, body-wear	
399,198	Johnson, W. S	Steam engines, triple-expansion	
397,553	Johnston, W. C., jr	Connectors	Feb. 12, 1889
386,636	Jones, L., jr	chines.	July 24, 1888
386,986	Joslin, W. E	Insulators	July 31, 1888
398,896	Kahan, S. and Craven, A. W.	Time alarms	Mar. 5, 1889
393,012   393,013	Kames, J	Locomotiondo	Nov. 20, 1888 Nov. 20, 1888
400,088	Kammeyer, C. E. K	Batteries, galvanic	
401,035	Kaselowsky, E	Telegraphy, circuit-closers	Apr. 9, 1889
397,295	Kearney, J. G.	Dynamometers	Feb. 5, 1889
399,334	Keller, C. M	Drop lights and hangers	
393,373	Keller, F. J. and Carnes, J. W	Motors	
393,508 385,863	Kellogg, M. G.	Telephones, systemsdo	
386,886	Kellogg, M. G.		
386,887	Kellogg, M. G.	do	
387,645	Kellogg, M. G.	do	Aug. 14, 1888
387,888	Kellogg, M. G	do	Aug. 14, 1888
387,889	Kellogg, M. G	do	Aug. 14, 1888
387,890 388,052	Kellogg, M. GKellogg, M. G		
388,283	Kellogg, M. G	do	
393,509	Kellogg, M. G.	do	
385,357	Kelly, J. E	Annunciators	
404,630	Kelly, J. F	Induction-coils	
395,622	Kelly, J. F	Magneto-electric	Jan. 1, 1889
399,269 395,748	Kelly, J. W	Telephones, switch-boards	
393,243	Ker, J. B. and Crawford, J	Telephones, systems	
397,006	Kester, J. F.	Regulators	Jan. 29, 1889
397,007	Kester, J. F	Magneto-electric	Jan. 29, 1889
399,147	Kester, J. F.	Regulators	
404,712 404,713	Kester, J. F.	Magneto-electricdo	
404,714	Kester, J. F	do	
404,715	Kester, J. F	do	
393,838	Kiel, W	Miscellaneous compositions	Dec. 4, 1888
388,053	Killin, V. C	Lights, arc, gravity feed, gear-clutch	
402,249	Kimball, J. L. and Wirt, H. C.	Cut-outs, thermal	T 1 0 1000
399,755	King, F		July 3, 1888
397,650	Kingsland, W		Feb. 12, 1889
402,165	Kinsey, I	Bells	Apr. 30, 1889
405,964	Kinsman, F. E	Car brakes	June 25, 1889
388,690	Kirwan, G. H		
395,706	Kitsee, I	Batteries, galvanic	Mar. 26, 1889
400,224 400,225	Kitsee, I	do	
400,226	Kitsee, I	Batteries, secondary	Mar. 26, 1889
400,227	Kitsee, I	Batteries, galvanic	Mar. 26, 1889
386,784	Knight, W. H	Locomotion	July 24, 1888
389,229	Knight, W. H	do	
389,230 389,658	Knight, W. H	Magneto-electric	
396,880	Knowles, E. R	Cut-outs, mechanical	Jan. 29, 1889
396,940	Knowles, E. R	Cut-outs, electro-magnetic	Jan. 29, 1889
396,941	Knowles, E. R	Magneto-electric	Jan. 29, 1889
396,942	Knowles, E. R	do	Jan. 29, 1889
397,557	Knowles, E. R.	Batteries, secondary	Feb. 12, 1889
397,729 399,052	Knowles, E. R.	Cut-outs, mechanical Batteries, secondary	Mar. 5, 1889
403,941	Knowles, E. R	Cut-outs, electro-magnetic	May 28, 1889
402,332	Knowlton, D. C	Igniting devices, manual	Apr. 30, 1889
405,420	Konigslow, H	Telephones, calls	June 18, 1889
405,566	Konigslow, O	Telephones, supports	June 18, 1889
385,760	Nookogey, W. P	Batteries, galvanic	oury 10, 1000

No.	Name.	CLASS.	DATE.
		D. v. d.	7 0 1000
395,835 395,836	Kookogey, W. P.	Batteries, galvanic Batteries, secondary, applications	
395,837	Kookogev, W. P	Batteries, galvanic	Jan. 8, 1889
396,748	Kookogey, W. P	Railway signals	Jan. 29, 1889
396,749	Kookogey, W. P	do	
396,750 398,737	Kookogey, W. P.	Batteries, galvanic	
401,953	Kookogey, W. P	Batteries, secondary	Apr. 23, 1889
402,166	Kookogey, W. P.	Batteries, galvanic	Apr. 30, 1889
392,736	Kotyra, M	Incrustation	Nov. 13, 1888
393,159 399,416	Kronenberg, E	Clocks, electric	Nov. 20, 1888 Mar. 12, 1889
393,477	Lake, W	Stone and brick making	Nov. 27, 1888
403,352	Lake, W	Conductors, underground	May 14, 1889
393,337	Lane, F. A	Electro-magnetic	Nov. 20, 1888
399,054 400,692	Lane, G. M	Lights, arc, gravity feed, gear-clutch	Mar. 5, 1889 Apr. 2, 1889
398,409	Lang, E. M	Batteries, secondary	Feb. 26, 1889
386,993	Lange, P	Galvanometers	July 31, 1888
386,992	Lange, P	N-4	July 31, 1888
392,437 392,438	Lange, P Lan	Metersdo	Nov. 6, 1888 Nov. 6, 1888
392,439	Lauge, P	do	Nov. 6, 1888
394,541	Latshaw, Z	Batteries, secondary, applications	Dec. 11, 1888
389,752	Lauckert, E. F. H. H	Magneto-electric	Sept. 18, 1888
399,336 400,463	Lauckert, E. F. H. H	Meters Lightning arresters	Mar. 12, 1889 Apr. 2, 1889
395,151	Laurence, A	Advertising, automatic devices	Dec. 25, 1888
400,464	Lawshe, S. R.	Lightning rods	Apr. 2, 1889
388,697	Lea, J	Lights, arc, positive feed, gear-clutch	
399,057 386,925	Lecoultre, I. E Lee, C. T	Telegraphy, circuit-closers	Mar. 5, 1889 July 31, 1888
392,679	Lee, G. M	Valve-controllers	
392,440	Lehman, J. H	Igniting devices	Nov. 6, 1888
400,232	Lehman, J. H	Telegraphy, circuit-closers	Mar. 26, 1889
403,944 396,701	Lehy, G. B	Igniting devices, automaticAlarms, burglar	May 28, 1889 Jan. 22, 1889
392,158	Lemp, H	Lights, incaudescent	Oct. 30, 1888
392,159	Lemp, H	Lights, filaments and carbons	Oct. 30, 1888
403,541	Lemp, H	Induction-coils	May 21, 1889
405,263	Lemp, H. and Wightman, M. J	RegulatorsLights, incandescent	June 18, 1889 Apr. 16, 1889
405,895	Leonard, H. W.	Lighting, systems	June 25, 1889
405,896	Leonard, H. W	do	June 25, 1889
405,897 401,041	Leonard, H. W. and Hauson, A	Batteries, secondary, applicationslnduction-coils	
391,477	Libbey, H. W	Lights, are, positive feed	
398,414	Lieb, C. A	Railways, pneumatic	Feb. 26, 1889
398,836	Lieb, C. A	mal do	
400,235 405,365	Liebert, E. and Rosenthal, S. A.Lineff, A. L.	Telegraphy, circuit closers	June 18 1889
404,850	Littleliales, G. H	Phonographs	June 11, 1889
394,380	Lloyd, E. L	Conductors, insulators	Dec. 11, 1888
402,752		Paring cuttors	
10,980 393,165	Lockwood, T. D	Paving, gutters Telephones, anti-induction devices	Nov. 20, 1888
392,443	Long, M. W	Railway signals	Nov. 6, 1888
392,444	Long, M. W	do	Nov. 6, 1388
396,212 395,157	Loomis F F	Medical and surgical, body-wear	Jan. 15, 1889 Dec. 25, 1888
396,579	Loomis, O. P	Cut-outs, thermal	Jan. 22, 1889
396,580	Loomis, O. P	Regulators	Jan. 22, 1889
396,581	Loomis, O. P.	Magneto-electric	Jan. 22, 1889
396,582 396,583	Loomis O P	Systems of distribution Lights, sockets and keys	Jan. 22, 1889 Jan. 22, 1889
402,753	Loomis, O. P	Cut-outs, thermal	May 7, 1889
402,754	Loomis, O. P	do	May 7, 1889
405,218		Regulators	
405,572 392,127	Love J. C	Lighting, systemsLocomotion	Oct 30 1888
400,862	Lowrie, W. and Hall, C. J	Induction-coils	Apr. 2, 1889
385,675	Lugo, O	Motors	July 3, 1888
394,075	Lugo, O	Pattories assendant applications	Dec. 4, 1888
396,213 396,214		Batteries, secondary, applications	
399,059	Lugo, O	Motors	Mar5, 1889
400,926	Lundell, R	Locomotion	Apr. 9, 1889

No.	Name.	· CLASS.	DATE.
393,710	Lüngen, A	Bells	Nov. 27, 1888
393,711	Lüngen, A	Magnetic locks and bolts	Nov. 27, 1888
396,407	Lynch, J		Jan. 22, 1889
405,576	Lynch, J Lynde, F. C	Spring scales	June 18, 1889
398,519 398,520	Lynde, F. C	do	Feb. 26, 1889 Feb. 26, 1889
398,521	Lynde, F. C	do	Feb. 26, 1889
394,192	Macbeth, J	Blasting and fuses	Dec. 11, 1888
397,300	Mack, W. B	Conductors, underground	Feb. 5, 1889
391,542 401,289	Madden, A. F	Metal-working, miscellaneous Batteries, secondary	Oct. 23, 1888 Apr. 9, 1889
401,290	Main, W	do	Apr. 9, 1889
401,291	Main, W	do	Apr. 9, 1889
402,683	Manning, C. E	Advertising, signs	May 7, 1889
401,191 393,072	Manwaren, A. H Marquand, A. J	MetersIncrustation	Apr. 9, 1889 Nov. 20, 1888
400,866	Marshall, W	Condensers	Apr. 2, 1889
402,027	Marshall, W	do	Apr. 23, 1889
385,363	Martel, A. F	Railway signals	July 3, 1888
385,677 397,194	Martel, A. F	Telegraphy, fire	July 3, 1888 Feb. 5, 1889
395,575	Marvin, H. N	Motors	Jan. 1, 1889
395,399	Mast, L. L	Lightning rods	Jan. 1, 1889
387,310	Mather, R. H	Motors	Aug. 7, 1888
390,245	Mather, R. H	Lights, arc, gravity feed, clutch	Oct. 2, 1888
390,180 402,684	Mather, W. and Hopkinson, J. and E Maxim, H. S	Magneto-electricSeparators	Sept. 25, 1888 May 7, 1889
405,170	Maxim, H. S.	Lights, filaments and carbons	June 11, 1889
405,239	Maxim, H. S	do	June 11, 1889
394,195	Maxwell, G. S	Telephones, systems	Dec. 11, 1888
385,815 398,420	Mayo, J. E McCarthy, L. A	Cut-outs, mechanical	July 10, 1888 Feb. 26, 1889
402,264	McCluer, C. E	Telephones, systems	Apr. 30, 1889
397,466	McCoy, A. T	Telegraphy, printing	Feb. 5, 1889
391,853	McDill, H. C	Cut-outs, electro-magnetic	Oct. 30, 1888
389,935 387,726	McDonald, W. H	Batteries, secondary, applications	Sept. 25, 1888 Aug. 14, 1888
387,526	McElroy, J. F	Cut-outs, mechanical	Aug. 7, 1888
392,213	McElroy, W. J	Systems of distribution	Nov. 6, 1888
393,073	McElroy, W. J. and McTiglie, T. J.	do	Nov. 20, 1888
404,361 399,341	McFeely, R. F	Applications, tools and machinesdodo	May 28, 1889 Mar. 12, 1889
388,294	McGowen, J. J.	Igniting devices	Aug. 21, 1888
385,519	McIndoe, G. F. and J. W.	Electrotyping	July 3, 1888
389,314	McIntire, C	Connectors	Sept. 11, 1888
400,239 405,221	McKinney, J. Y	Alarms, burglar	Mar. 26, 1889 June 11, 1889
385,565	McLaughlin, J. F	Telegraphy, printing	July 3, 1888
386,597	McLaughlin, J. F	Annunciators	July 24, 1888
386,646	McLaughlin, J. F	Telegraphy, printing	July 24, 1888
388,140	McLaughlin, J. F		Aug. 21, 1888
388,141 388,142	McLaughlin, J. F	do	Aug. 21, 1888 Aug. 21, 1888
388,143	McLaughlin, J. F	do	Aug. 21, 1888
393,998	McLaughlin, J. F	Bells	Dec. 4, 1888
393,170 392,520	McMurray, L	Lights, filaments and carbons	Nov. 20, 1888 Nov. 6, 1888
405,427	Melaney, W. H	Lamps, shades	June 18, 1889
395,816	Mellett, L	Telephones, mechanical	Nov. 13, 1888
395,163	Meloon, I. L. and Whiting, P. S	Railway signals	Dec. 25, 1888
397,992	Merkel, G. II	Chemicals, metalloids	Feb. 19, 1889 July 17, 1888
386,149 386,150	Meserole, A. V	Batteries, galvanicdo	July 17, 1888 July 17, 1888
388,430	Meserole, A. V	do	Aug. 28, 1888
399,274	Mcserole, A. V	Batteries, secondary	Mar. 12, 1889
393,272	Mestern, M	Batteries, thermal	Feb. 19, 1889
387,432 397,657	Meston, A. W	Alarms	Ang. 7, 1888 Feb. 12, 1889
389,894	Meyers, W. G. and Coward, F. E	Magneto-clectric	Sept. 25, 1888
400,352	Milier, W. H	Lights, arc, gravity feed, clutch	Mar. 26, 1889
391,547	Milliken, G. F	Bells	
394,784 385,770	Milliken, G. F. Mingle, G. W. and M.	Telegraphy, fireCut-outs, thermal	
386,340	Miot, G	Magneto-electric	July 17, 1888
386,648	Miot, G	Galvanometers	July 24, 1888
385,943	Mitchell, T. B.	Magneto-electric Bells	July 10, 1888
402,960	Moffatt, R. R	Della	may 1, 1009

Moldenke, R. G. G	Apr. 2, 1889 Sept. 11, 1888 Sept. 18, 1888 Aug. 28, 1889 June 11, 1889 July 24, 1888 Apr. 23, 1889 Oct. 9, 1888 Mar. 26, 1889 Oct. 9, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888
400,473         Moore, A. T., jr. and Fitch, H. A         Lights, incandescent, special features           389,526         Moore, F         Lamp shades           389,758         Morrell, A. W         Lighting, systems           388,707         Morris, H. G         Meters           400,591         Morton, W. J         Telephones, electric           405,045         Mowrer, M. L         Separators           386,754         Muir, J. S         Electrodes           402,099         Munier, C. J. A         Telegraphy, printing           398,069         Nagle, A. F         Alarms           390,795         Neu, G. S         Magnetic locks and bolts           400,245         Neu, G. S         Steam valves, throttle           390,891         Newlands, A. M         Knitting and netting, stopping           389,096         Newman, E. A         Valve controllers           389,097         Newman, E. A         Thermostats           Newman, E. A         Thermostats           Newman, E. A         Thermostats           389,090         Newman, E. A         Thermostats           389,090         Newman, E. A         Thermostats           389,090         Newman, E. A         A           389,090 <td< td=""><td>Apr. 2, 1889 Sept. 11, 1888 Sept. 18, 1888 Aug. 28, 1889 June 11, 1889 July 24, 1888 Apr. 23, 1889 Feb. 19, 1889 Oct. 9, 1888 Mar. 26, 1889 Oct. 9, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888</td></td<>	Apr. 2, 1889 Sept. 11, 1888 Sept. 18, 1888 Aug. 28, 1889 June 11, 1889 July 24, 1888 Apr. 23, 1889 Feb. 19, 1889 Oct. 9, 1888 Mar. 26, 1889 Oct. 9, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888
S89,526   Moore, F   Lamp shades	Sept. 11, 1888 Sept. 18, 1888 Aug. 28, 1888 Apr. 2, 1889 June 11, 1889 July 24, 1888 Apr. 23, 1889 Oct. 9, 1888 Mar. 26, 1889 Oct. 9, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888
388,707         Morris, H. G.         Meters.           400,691         Morton, W. J.         Telephones, electric.           405,045         Mowrer, M. L.         Separators           386,754         Muir, J. S.         Electrodes.           402,099         Munier, C. J. A         Telegraphy, printing.           398,069         Nagle, A. F.         Alarms.           390,795         Neu, G. S.         Magnetic locks and bolts.           400,245         Neu, G. S.         Steam valves, throttle.           399,991         Newlands, A. M.         Knitting and netting, stopping.           389,096         Newman, E. A         Valve controllers.           389,097         Newman, E. A         Thermostats.           389,098         Newman, E. A         Thermostats.           389,099         Newman, E. A         Thermostats.           389,090         Newman, E. A         Thermostats.           389,090         Newman, E. A         Thermostats.           389,000         Newman, E. A	Aug. 28, 1888  Apr. 2, 1889  June 11, 1889  July 24, 1888  Apr. 23, 1889  Feb. 19, 1889  Oct. 9, 1888  Mar. 26, 1889  Oct. 9, 1888  Sept. 4, 1888  Sept. 4, 1888  Sept. 4, 1888
Morton, W. J	Apr. 2, 1889 June 11, 1889 July 24, 1888 Apr. 23, 1889 Feb. 19, 1889 Oct. 9, 1888 Mar. 26, 1889 Oct. 9, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888
405,045         Mowrer, M. L.         Separators           386,754         Muir, J. S         Electrodes           402,099         Munier, C. J. A         Telegraphy, printing           398,069         Nagle, A. F         Alarms           390,795         Neu, G. S         Magnetic locks and bolts           400,245         Neu, G. S         Steam valves, throttle           390,891         Newlands, A. M         Knitting and netting, stopping           389,096         Newman, E. A         Valve controllers           389,097         Newman, E. A         Thermostats           389,098         Newman, E. A         Thermostats           389,090         Newman, E. A         — do           389,100         Newman, E. A         — do	June 11, 1889 July 24, 1888 Apr. 23, 1889 Feb. 19, 1889 Oct. 9, 1888 Mar. 26, 1889 Oct. 9, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888
386,754   Muir, J. S   Electrodes	July 24, 1888 Apr. 23, 1889 Feb. 19, 1889 Oct. 9, 1889 Oct. 9, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888
402,099       Munier, C. J. A       Telegraphy, printing         398,069       Nagle, A. F       Alarms         390,795       Neu, G. S       Magnetic locks and bolts         400,245       Neu, G. S       Steam valves, throttle         390,891       Newlands, A. M       Knitting and netting, stopping         389,096       Newman, E. A       Thermostats         389,097       Newman, E. A       Valve controllers         389,098       Newman, E. A       Thermostats         389,099       Newman, E. A       — do         389,100       Newman, E. A       — do	Apr. 23, 1889 Feb. 19, 1889 Oct. 9, 1889 Oct. 9, 1889 Oct. 9, 1889 Sept. 4, 1888
398,069       Nagle, A. F       Alarms         390,795       Neu, G. S       Magnetic locks and bolts         400,245       Neu, G. S       Steam valves, throttle         390,891       Newlands, A. M       Knitting and netting, stopping         389,096       Newman, E. A       Thermostats         389,097       Newman, E. A       Valve controllers         389,098       Newman, E. A       Thermostats         389,099       Newman, E. A       do         389,100       Newman, E. A       do	Feb. 19, 1889 Oct. 9, 1888 Mar. 26, 1889 Oct. 9, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888
390,795   Neu, G. S.   Magnetic locks and bolts	Oct. 9, 1888 Mar. 26, 1889 Oct. 9, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888
400,245       Neu, G. S.       Steam valves, throttle         390,891       Newlands, A. M.       Knitting and netting, stopping         389,096       Newman, E. A.       Thermostats         389,097       Newman, E. A.       Valve controllers         389,098       Newman, E. A.       Thermostats         389,100       Newman, E. A.       ————————————————————————————————————	Mar. 26, 1889 Oct. 9, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888 Lead of the control of the c
390,891       Newlands, A. M       Knitting and netting, stopping         389,096       Newman, E. A       Thermostats         389,097       Newman, E. A       Valve controllers         389,098       Newman, E. A       Thermostats         389,100       Newman, E. A       ————————————————————————————————————	Oct. 9, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888 Lept. 4, 1888
389,096       Newman, E. A       Thermostats         389,097       Newman, E. A       Valve controllers         389,098       Newman, E. A       Thermostats         389,099       Newman, E. A       —	Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888
389,097       Newman, E. A       Valve controllers         389,098       Newman, E. A       Thermostats         389,099       Newman, E. A      do         389,100       Newman, E. A      do	Sept. 4, 1888 Sept. 4, 1888 Sept. 4, 1888
389,098 Newman, E. A	Sept. 4, 1888 Sept. 4, 1888
389,099 Newman, E. Ado	Sept. 4, 1888
389,100 Newman, E. A	0 1
280 899 Nicholson I D McElroy W I and Ma Locametica	Sept. 4, 1888
389,822 Nicholson, J. D., McElroy, W. J. and Mc- Locomotion	
Tighe, T. J.	1 /
403,439 Nickerson, W. E Applications, tools and machines	May 14, 1889
403,440 Nickerson, W. E	May 14, 1889
403,441 Nickerson, W. E dodo	1 2, 2000
403,442 Nickerson, W. E	
403,691 Nickerson, W. Edodo	
404,015 Nickerson, W. E	
404,221 Nickerson, W. Edo	
11,002 Noble, C. B	
403,955   Noble, C. B	
401,200 Norris, W. E	1 1 1
388,438 Nutter, F. H Alarms, burglar	
401,789 Nutter, F. H	
391,761 Nutting, S. E Lights, arc, gravity feed, clutch	
393,849 Nutting, S. E	
398,744 Nutting, S. E	
400,476   Nutting, S. E Lights, arc, gravity feed, gear-clutch	
403,482 O'Beirne, W. H. Insulators	
403,483 O'Connell, J. J. Telephones, systems	May 14, 1889
404,426 Oehmeu, G. T. Telegraphy, printing	June 4, 1889
388,300 O'Kelly, J Steering and propulsion	
399,549 Olsen, T Testing machines	
399,154 O'Neil, J	
389,001 Ongley, C. E	
389,853 Ongley, C. Edo	
391,855 Ongley, C. E Telegraphy, circuit-closers	
387,366   Orcutt, E. L	Aug. 7, 1888
403,549 Orford, J. M Locomotion	May 91 1880
405,742 Orford, J. M Lights, incandescent, special features	June 25, 1889
401,366 Osborn, C. V Induction-coils	
390,033 Otis, C. R. Elevators	
387,654 Overlack, B Batteries, galvanic Batteries	Aug. 14, 1888
404,651   Paca, W. S	June 4, 1889
390,310 Packard, J. W Lights, filaments and carbons	Oct. 2, 1888
391,815   Packard, J. Wdo	Oct. 30, 1888
391,816   Packard, J. W	
392,686 Packard, J. W Air and gas pumps, mechanical	
396,951 Packard, J. W Photometers	
401,580 Packard, J. W Air and gas pumps, mechanical	
401,582 Packard, J. W Valve controllers	Apr. 16, 1889
393,657   Packer, R. and Cochran, I. E., jr Alarms, burglar Locomotion	
393,573 Paget, L Batteries, secondary Batteries	
393,574 Paget, L Lights, arc, gravity feed, clutch Lights	
393,575 Paget, L Batteries, secondary	Nov. 27 1888
393,576 Paget, L	
393,577 Paget, L	
393,578 Paget, L Salines Salines	
397,607 Paget, L Batteries, secondary	
397,608 Paget, L	Feb. 12, 1889
394,207 Paige, D. O Conductors, underground	
393,389 Paine, W. J	Nov. 27, 1888
399,550 Paiste, H. T	
399,155 Palmer, H. J. Railway signals Railway signals	
400,479 Parke, J. G Igniting devices, manual	
385,956   Parks, N Telephones, electric	July 10, 1888

Sas				
Section	No.	Name.	CLASS.	DATE.
Section	391.070	Parrish W W and Cole W R	Magneto-electric	Oct 16 1888
200,502   Patten, F. J.				
329,290   Patten, F. J.			Torpedoes	
382,969   Patten, F. J	390,802			
395,508   Patten, F. J.				
395,509   Patten, F. J		Patten, F. J.	Telegraphy, multiplex	
Motors		Patten, F. J	do	
397,817   Patten, F. J.				
398,749   Pattern F. J. and Bingham, T. A   Annunciators   Dec. 4, 1888   398,441   Patterson, W. R   Conductors   Feb. 26, 1889   398,441   Patterson, W. R   Conductors   Feb. 26, 1889   492,447   Patterson, W. R   Conductors   C				
394,91   Patterson, W. R.   Conductors   Peb. 26, 1889   398,441   Patterson, W. R.   Conductors   Peb. 26, 1889   398,442   Patterson, W. R.   Thermostats   Apr. 30, 1859   403,481   Patterson, W. R.   Thermostats   Apr. 30, 1859   405,675   Pearson, J. T.   Lights, are greial features   Jan. 18, 1889   405,675   Pearson, J. T.   Lights, are greial features   Jan. 18, 1889   405,675   Pearson, J. T.   Batteries, secondary   Feb. 19, 1889   405,675   Pearson, J. T.   Batteries, secondary   Feb. 19, 1889   405,675   Pearson, J. T.   Batteries, secondary   Feb. 19, 1889   405,675   Pearson, J. T.   Batteries, secondary   Feb. 19, 1889   405,675   Pearson, J. T.   Batteries, secondary   Feb. 19, 1889   405,675   Pearson, J. T.   Batteries, secondary   Feb. 19, 1889   405,675   Pearson, J. T.   Batteries, secondary   Feb. 19, 1889   405,675   Pearson, J. T.   Batteries, secondary   Feb. 19, 1889   405,675   Pearson, J. T.   Batteries, secondary   Feb. 19, 1889   405,622   Pearson, J. T.   Batteries, secondary   Feb. 19, 1889   405,622   Pearson, J. T.   Batteries, secondary   Magneto-electric				
Age		Patten, F. J. and Bingham, T. A	Annunciators	
402,347   Patterson, W. R.   Apr. 30, 1859   306,365   Panl, W. C. and Kleinsteuber, O. D.   Railway signals   Jan. 15, 1859   306,365   Panl, W. C. and Kleinsteuber, O. D.   Railway signals   Jan. 15, 1859   405,070   Pearson, J. T.   Lights, are, special features   Jan. 28, 1859   405,070   Pearson, J. T.   Lights, are, special features   Jan. 28, 1859   405,070   Pearson, J. T.   Lights, are, special features   Jan. 28, 1859   309,343   Penney, W. L. and Little, T.   Conductors, underground   Mar. 12, 1859   309,343   Penney, W. L. and Little, T.   Conductors, underground   Mar. 12, 1850   309,343   Penney, W. L. and Stuart, D. C.   Conductors, underground   Mar. 12, 1850   309,343   Pernet, F. A.   A.   Moros   May. 14, 1859   309,345   Perret, F. A.   Moros   May. 14, 1859   309,547   Peters, C. H.   Hallway signals   July 10, 1858   309,5223   Perret, F. A.   Moros   June 11, 1859   309,474   Piannkuche, G. and A.   Magneto-electric   May. 14, 1859   309,174   Piannkuche, G.   And   Magneto-electric   Sept. 25, 1858   309,1270   Piannkuche, G.   And   Magneto-electric   Sept. 25, 1858   309,1270   Piannkuche, G.   And   Magneto-electric   Sept. 25, 1858   309,1270   Piannkuche, G.   Regulators   Moros   May. 14, 1859   309,443   Piannkuche, G.   And   Magneto-electric   Sept. 25, 1858   309,422   Piannkuche, G.   Regulators   Moros   May. 14, 1859   404,859   Piannkuche, G.   Regulators   Moros   Moros   Moros   404,559   Piannkuche, G.   Regulators   Moros   Moros   404,559   Piannkuche, G.   Regulators   404,559   Piannkuche, G.   Regulators   404,559   Piannkuche, G.   Regulators   404,659   Piannkuche, G.   Regulators   40				
403,454   Patterson, W. R.		Patterson, W. K.	Thermostate	
396,365   Panl, W. C. and Kleinsteuber, O. D.   Railway signals.   Jan. 15, 1859   395,755   Paurson, J. T.   Lights, arc, special features   June 25, 1859   399,373   Penrey, W. L. and Little, T.   Conductors, underground   Mar. 12, 1859   399,373   Penrey, F. A.   And Stuart, D. C.   Railways, pneumatic   Dec. 25, 1858   395,170   Perkins, E. A. and Stuart, D. C.   Railways, pneumatic   Dec. 25, 1858   405,223   Perret, F. A.   Magneto-electric   May 14, 1859   405,223   Perret, F. A.   Motors.   June 11, 1859   385,577   Perrit, H. S. and Bresson, H. S.   Thermostals   Aug. 24, 1858   389,374   Pfannkuche, G.   Aug. 24, 1858   389,374   Pfannkuche, G.   Lights, arc, gravity, feed, gear-clutch   Nov. 27, 1858   380,442   Pfannkuche, G.   Galvanometers   June 11, 1859   404,859   Pfannkuche, G.   Galvanometers   June 11, 1859   404,859   Pfannkuche, G.   Galvanometers   June 11, 1859   404,860   Pfannkuche, G.   Galvanometers   June 11, 1859   404,860   Pfannkuche, G.   Galvanometers   June 11, 1859   404,861   Pfannkuche, G.   Galvanometers   June 11, 1859   405,174   Pfannkuche, G.   Regulators   June 11, 1859   406,1059   Plain, J. H.   Batteries, secondary, applications   Aug. 14, 1858   407,349   Pfatischer, M.   Batteries, secondary, applications   Aug. 14, 1858   408,349   Pfatischer, M.   Batteries, galvanic   Apr. 30, 1859   405,600   Pipps, E. H.   Conductors, underground   Peb. 5, 1859   405,600   Pipps, E. H.   Conductors, underground   Peb. 5, 1859   405,600   Pipps, E. H.   Conductors, underground   Peb. 5, 1859   405,600   Pipps, E. H.   Conductors, underground   Peb. 5, 1859   406,607   Prece, A. M.   Advertising, automatic devices.   Peb. 19, 1859   406,607   Prece, A. M.   Advertising, automatic devices.   Peb. 19, 1859   406,607   Prece, J. B.   Health, A.   Health, A.   Health, A.   Health, A.   Health, A.   Health				
1985/150   Pawlowski, J				
September   Sept		Pawlowski, J	Lights, arc, special features	Jan. 8, 1889
399,434 Penney, W. L. and Little, T. Conductors, underground. Mar. 12, 1898 395,170 Perkins, C. G. Cut-outs, mechanical Dec 25, 1888 395,170 Perret, F. A. Magneto-electric May 1, 1899 405,233 Perret, F. A. Magneto-electric May 1, 1899 405,233 Perret, F. A. Moors. June 11, 1899 385,5577 Peters, C. H. Brankuche, G. and A. Magneto-electric Sept. 25, 1888 399,974 Pfannkuche, G. and A. Magneto-electric Sept. 25, 1888 399,974 Pfannkuche, G. d. Lights, arc, gravity, feed, gear-clutch Nov. 27, 1888 393,447 Pfannkuche, G. Regulators Nov. 27, 1888 393,447 Pfannkuche, G. Regulators Nov. 27, 1888 394,429 Pfannkuche, G. G. Galvanometers June 11, 1859 404,850 Pfannkuche, G. G. Galvanometers June 11, 1859 404,850 Pfannkuche, G. G. Galvanometers June 11, 1859 404,950 Pfannkuche, G. Galvanometers June 11, 1859 404,950 Pfannkuche, G. Galvanometers June 11, 1859 404,950 Pfannkuche, G. Regulators June 11, 1859 405,577 Pickernell, F. A. Batteries, galvanic Apr. 30, 1859 401,059 Phalaa, J. H. Batteries, galvanic Apr. 30, 1859 401,059 Phalaa, J. H. Batteries, galvanic Apr. 30, 1859 405,554 Phips, E. H. Conductors, underground Peb. 5, 1859 405,564 Phips, E. H. Conductors, underground Peb. 5, 1859 405,564 Phips, E. H. Conductors, underground Peb. 5, 1859 405,677 Pickernell, F. A. Telephones, sugar attention, underground Peb. 5, 1859 405,677 Pickernell, F. A. Telephones, sugar attention, underground Peb. 5, 1859 405,677 Pickernell, F. A. Telephones, sugar attention, underground Apr. 30, 1859 405,677 Pickernell, F. A. Telephones, sugar attention, underground Apr. 30, 1859 405,670 Pickernell, F. A. Telephones, calls May 21, 1859 405,670 Pickernell, F. A. Telephones, sugar attention, underground Apr. 30, 1859 405,670 Pickernell, F. A. Telephones, sugar attention Devention Apr. 30, 1859 405,750 Pickernell, F. A. Telephones, sugar attention Devention Ap				
382,633 Perkins, C. G.  Subject of Perkins, E. A. and Stuart, D. C.  Sability of Perkins, E. A. and Stuart, D. C.  Sability of Perkins, E. A. and Stuart, D. C.  Sability of Perkins, E. A. and Stuart, D. C.  Sability of Perkins, E. A. and Stuart, D. C.  Sability of Perkins, E. A. and Stuart, D. C.  Sability of Perkins, E. A. and Stuart, D. C.  Sability of Perkins, E. A. and Stuart, D. C.  Sability of	398,070	Penney W. L. and Little T	Conductors underground	
395,170   Perkins, E. A. and Stuart, D. C.   Railways, pneumatic   Dec. 25, 1888   406,233   Perret, F. A.   Magneto-electric   May 14, 1889   405,233   Perret, F. A.   Motors.   June 11, 1889   388,555.   Petit, H. S. and Bresson, H. S.   Thermostats   Aug. 28, 1888   389,974   Pfannkuche, G. and A.   Magneto-electric   Sept. 25, 1888   391,270   Pfannkuche, G.   do.   Oct. 16, 1888   393,441   Pfannkuche, G.   Regulators   Nov. 27, 1888   393,441   Pfannkuche, G.   Regulators   Nov. 27, 1888   393,442   Pfannkuche, G.   Regulators   Nov. 27, 1888   394,422   Pfannkuche, G.   Galvanometers   June 11, 1859   404,560   Pfannkuche, G.   Galvanometers   June 11, 1859   404,560   Pfannkuche, G.   Galvanometers   June 11, 1859   404,561   Pfannkuche, G.   Galvanometers   June 11, 1859   404,561   Pfannkuche, G.   Galvanometers   June 11, 1859   404,561   Pfannkuche, G.   Regulators   June 11, 1859   404,561   Pfannkuche, G.   Galvanometers   June 11, 1859   404,561   Pfannkuche, G.   Galvanometers   June 11, 1859   404,561   Pfannkuche, G.   Galvanometers   June 11, 1859   404,561   Pfannkuche, G.   Regulators   June 11, 1859   404,561	392,633			
405,223   Perret, F. A	395,170		Railways, pneumatic	
SSS,507   Petri, H. S. and Bresson, H. S.				
388,505   Petit, H. S. and Bresson, H. S.   Thermostats   Aug. 25, 1888   399,74   Pfamkuche, G   do   do   Oct. 16, 1888   393,447   Pfamkuche, G   Lights, are, gravity, feed, gear-clutch   Nov. 27, 1888   393,445   Pfamkuche, G   Regulators   Nov. 27, 1888   393,445   Pfamkuche, G   Regulators   Nov. 27, 1888   396,422   Pfamkuche, G   do   Jan. 22, 1889   Jan. 404,850   Pfamkuche, G   Galvanometers   June 11, 1889   June 11, June 11, June 12, June 13, June 14, June 14, June 14, June 14, June 14, June 15, June 18,				
399,74   Pfamkuche, G. and A.   Magneto-electric   Sept. 25, 1888   391,270   Pfamkuche, G.   do.   Oct. 16, 1888   393,447   Pfamkuche, G.   Lights, arc, gravity, feed, gear-clutch   Nov. 27, 1888   393,447   Pfamkuche, G.   Regulators   Nov. 27, 1888   396,429   Pfamkuche, G.   do.   June 11, 1889   404,859   Pfamkuche, G.   do.   June 11, 1889   404,850   Pfamkuche, G.   do.   June 11, 1889   404,851   Pfamkuche, G.   do.   June 11, 1889   405,174   Pfamkuche, G.   Regulators   June 11, 1889   406,2349   Pfaitscher, M.   Batteries, secondary, applications   Aug. 14, 1888   406,2349   Pfaitscher, M.   Aug. 24, 1888   406,377   Pickernell, F.   Ratteries, galvanie   Apr. 9, 1889   385,384   Phipps, E. H.   Conductors, underground   Apr. 9, 1889   385,584   Phipps, E. H.   Conductors, underground   Aug. 28, 1888   405,596   Pickernell, F. A.   Telephones, supports   Ged. gear-clutch   June 28, 1889   389,227   Pickernell, F. A.   Telephones, supports   Ged. gear-clutch   June 28, 1889   403,776   Pope, E.   Telephones, calls   May 21, 1889   389,227   Picre, A. M.   Advertising, automatic devices   Feb. 19, 1889   389,227   Picre, A. M.   Advertising materials   Nov. 20, 1888   403,776   Pope, E.   Telephones, calls   May 21, 1889   403,770   Pope, E.   Telephones, calls   May 21, 1889   404,700   Pratt, H. P.   Medical and surgical, body-wear   June 11, 189   402,101   Prescott, G. B., ir   do.   do.   Apr. 30, 1889   402,101   Pratt, H. P.   Medical and surgical, body-wear   June 11, 189   402,101   Prescott, G. B., ir   do.   do.   Apr. 30, 1889   402,101   Prescott, G. B., ir   do.   do.   Apr. 30, 1889   403,751   Pratt, H.				
391,270   Pfannkuche, G				
393,445   Fiankuche, G	391,270	Pfannkuche, G	do	
196,422   Pfannkuche, G				
404,850   Pfannkuche, G		Pfannkuche, G	Regulators	
404,860   Pfannkuche, G		Pfannkuche, G		
March   Marc		Pfannkuche, G	Galvanometers	
Steeling			do	June 11, 1889
102,349   Pfatischer, M			Regulators	June 11, 1889
101,059   Phalan, J. H.   Batteries, galvanic   Apr. 9, 1859   1859			do	
Section   Sect				
Abs.		Phelps, W. S.	Railways, traction, underground	Feb. 5, 1889
405,906				
Hospital		Pickernell F A		
September   Sept				
403,776	398,276	Pierce, A. M	Advertising, automatic devices	Feb. 19, 1889
S87,732				
Medical and surgical, body-wear	_ /			
Pratt, H. P			Medical and surgical body-wear	Aug. 14, 1888
403,211	000	Pratt, H. P	do	Oct. 23, 1888
Apr. 23, 1889   Apr. 23, 1889   Apr. 24, 1889   Apr. 25, 1889   Apr. 30, 1889   Apr. 4, 1889		Pratt, H. P	Watch cases	May 14, 1889
402,190   Prescott, G. B., jr				
402,191   Prescott, G. B., jr	, , , ,			
402,192		Prescott, G. B., jr	do	Apr. 30, 1889
404,559   Priest, E. D   Locomotion   June 4, 1889   399,556   Putnam, T. A. B   Railway signals   Mar. 12, 1889   401,065   Rabe, H   Clocks, electric   Apr. 9, 1889   386,030   Rae, J. H   Amalgamators, electric   July 10, 1888   402,613   Rainey, W. K   Bells   May 7, 1889   393,391   Ram, G. S   Lights, filaments and carbons   Nov. 27, 1888   394,296   Rand, E. R   Batteries, galvanic   Dec. 11, 1888   401,207   Randall, J. D   Telegraphy, circuit-closers   Oct. 30, 1888   394,881   Reckenzaun, A   Meters   Dec. 18, 1888   401,515   Reed, F. H   Locomotion   Apr. 16, 1889   401,667   Reilly, J. C   Telephoues, switch-boards   Apr. 9, 1889   390,903   Reinmann, A. L   Lights, filaments and carbons   Apr. 9, 1889   404,112   Reinmann, A. L   Lights, filaments and carbons   Apr. 9, 1889   397,754   Rheiner, H. S   do   Feb. 12, 1889	402,192	Prescott, G. B., ir	do	Apr. 30, 1889
Sas, 583   Raab, K		Price, J. B	Batteries, secondary	May 28, 1889
888,583         Raab, K         Meters         Aug. 28, 1888           401,065         Rabe, H         Clocks, electric         Apr. 9, 1889           386,030         Rae, J. H         do         Mar. 5, 1889           399,209         Rae, J. H         do         Mar. 5, 1889           402,613         Rainey, W. K         Bells         May 7, 1889           393,391         Ram, G. S         Lights, filaments and carbons         Nov. 27, 1888           394,296         Rand, E. R         Batteries, galvanic         Dec. 11, 1888           401,207         Randall, C. A         Motors, miscellaneous         Apr. 9, 1889           394,818         Reckenzaun, A         Meters         Oct. 30, 1888           394,880         Reckenzaun, A         Meters         Dec. 18, 1888           401,515         Reed, F. H         Locomotion         Apr. 9, 1889           401,515         Reed, F. H         Locomotion         Apr. 9, 1889           401,967         Reilly, J. C         Telephoues, switch-boards         Apr. 9, 1889           404,112         Reinmann, A. L         Lights, filaments and carbons         May 28, 1889           397,754         Rheiner, H. S         do         Feb. 12, 1889		Putnam T A R	Railway signals	June 4, 1889
401,065   Rabe, H				
399,209   Rae, J. H	401,065			
402,613         Rainey, W. K         Bells         May 7, 1889           393,391         Ram, G. S.         Lights, filaments and carbons         Nov. 27, 1888           394,296         Rand, E. R.         Batteries, galvanic         Dec. 11, 1888           401,207         Randall, C. A.         Motors, miscellaneous         Apr. 9, 1889           394,881         Reckenzaun, A.         Meters         Dec. 18, 1888           394,880         Reckenzaun, A. and Pentz, J. A.         Meters         Dec. 18, 1888           401,515         Reed, F. H.         Locomotion         Apr. 16, 1889           401,067         Reilly, J. C.         Telephoues, switch-boards         Apr. 9, 1889           390,903         Reinmann, A. L.         Lights, filaments and carbons         Oct. 9, 1888           404,112         Reinmann, A. L. and Lange, P.         Lights, filaments and carbons         May 28, 1889           397,754         Rheiner, H. S.         do.         Feb. 12, 1889				
Samon   Samo				
394,296   Rand, E. R				
401,207   Randall, C. A	394,296	Rand, E. R	Batteries, galvanic	Dec. 11, 1888
394,881   Reckenzaun, A   Meters   Dec. 18, 1888		Randall, C. A	Motors, miscellaneous	Apr. 9, 1889
394,880       Reckenzaun, A. and Pentz, J. A				
401,515   Reed, F. H       Locomotion       Apr. 16, 1889         401,067   Reilly, J. C       Telephoues, switch-boards       Apr. 9, 1889         390,903   Reinmann, A. L       Lights, incandescent       Oct. 9, 1888         404,112   Reinmann, A. L. and Lange, P       Lights, filaments and carbons       May 28, 1889         397,754   Rheiner, H. S       Rheiner, H. S       Go       Feb. 12, 1889				
401,067       Reilly, J. C       Telephoues, switch-boards       Apr. 9, 1889         390,903       Reinmann, A. L.       Lights, incandescent       Oct. 9, 1888         404,112       Reinmann, A. L. and Lange, P       Lights, filaments and carbons       May 28, 1889         397,754       Rheiner, H. S       do       Feb. 12, 1889	401,515		Locomotion	Apr. 16, 1889
404,112 Reinmann, A. L. and Lange, P. Lights, filaments and carbons	401,067	Reilly, J. C	Telephoues, switch-boards	Apr. 9, 1889
397,754 Rheiner, H. S feb. 12, 1889		Reinmann, A. L.	Lights, incandescent	
394,999 Rice, E. W., jr Magneto-electric Dec. 25, 1888			do	Feb. 12, 1889
		Rice, E. W., jr	Magneto-electric	Dec. 25, 1888

No.	Name.	CLASS.	DATE.
396,602	Rice, E. W., jr	Regulators	Jan. 22, 1889
397,613	Rice, E. W., jr	do	
400,486 396,603	Rice, E. W., jr. and Rohrer, A. L	do	
399,163	Ricketson, J. C.	Indicators	Mar. 5, 1889
404,866 404,867	Ricketson, J. C.	do	
386,085	Ries, E. É	Locomotion	July 10, 1888
386,086		do	
386,087 386,088	Ries, E. E	Heaters	July 10, 1888
390,619	Ries, E. E	do	Oct. 2, 1888
390,904 390,905	Ries, E. E	Motorsdo	Oct. 9, 1888 Oct. 9, 1888
390,906	Ries, E. E	Magneto-electric	Oct. 9, 1888
392,757	Ries, E. E	Locomotion Heaters	Nov. 13, 1888
402,107 402,108	Ries, E. E	do	Apr. 23, 1889 Apr. 23, 1889
402,971	Ries, E. E	Systems of distribution	May 7, 1889
403,374 404,306	Ries, E. E	Heatersdo	
401,591	Riesenberg, H	Railway signals	
394,883	Riethmann, G. W.	Magneto-electric	Dec. 18, 1888
389,011 393,266	Riker, A. L.		Sept. 4, 1888 Nov. 20, 1888
392,970	Ritchie, F	Annunciators	Nov. 13, 1888
396,667	Robbins, A. C	Alarms, burglar	Jan. 22, 1889
404,226 392,971	Robbins, I		
385,774	Roberts, DeW. C	do	July 10, 1888
386,090	Roberts, I. L		July 10, 1888
392,167 394,613	Roberts, I. L	Regulators Batteries, galvanic	Oct. 30, 1888 Dec. 18, 1888
394,615	Roberts, I. L.	do	Dec. 18, 1888
394,616	Roberts, I. L	do	Dec. 18, 1888
394,617 396,367	Roberts, I. L.		Dec. 18, 1888 Jan. 10, 1009
396,368	Roberts, I. L	do	Jan. 15, 1889
396,360 394,614	Roberts, I. L. and Brevoort, H. L	Batteries, galvanic	
399,213	Robertson, J. H	Magneto-electric	
403,291	Robertson, J. II		May 14, 1889
403,292 405,743	Robertson, J. H	Telegraphy, circuits and systems Regulators	May 14, 1889 June 25, 1889
400,951	Robinson, M	Annunciators	Apr. 9, 1889
400,600 402,481	Rockwell, F. C	Lights, incandescent, special features Lights, sockets and keys	Apr. 2, 1889
400,011	Rogers, T. B. and Bartlett, S. H		Mar. 19, 1889
403,376	Rogers, N. and Wharry, J. A	Air and gas engines, explosive	May 14, 1889
403,379 403,380	Rogers, N. and Wharry, J. A	do	May 14, 1889
393,395	Roosevelt, H. L	Batteries, galvanic	Nov. 27, 1888
393,123	Root, F. H	Electro-magnets	Nov. 20, 1888
400,795 389,601	Rosebrugh, A. M	Telephones, mechanical	Sept. 18, 1888
405,602	Rosenqvist, C. L.	Magneto-electric	June 18, 1889
401,518 393,078		RegistersAnnunciators	
391,820	Rossney, W. C. and Hunt, C. L	Printing, delivering	Oct. 30, 1888
400,492	Rousseau, D	Igniting devices, manual	Apr. 2, 1889
405,604 404,438		Electrolysis	
404,986	Rudolfy, J.	Inhalers and respirators	June 11, 1889
398,456 392,228	Runely, W. N.	Steam engines, speed governors, centrifugal	Feb. 26, 1889 Nov. 6 1889
401,304	Russell, C. W. and Drake, J. I	Drop-lights and hangers	Apr. 9, 1889
389,764	Rutter, N. P	Medical and surgical, body-wear	Sept. 18, 1888
385,727 394,015	Salisbury, W. S	Locomotion	Dec. 4, 1888
401,970	Sandwell, W. D	do	Apr. 23, 1889
405,507	Sandwell, W. D	Magneto-electric	June 18, 1889
386,561   391,276		Annunciators	
389,857	Scales, E: A	Fare registers	Sept. 18, 1888
392,230 395,357		Clocks, electric	
388,723		Lights, arc, special features	

No.	Name.	CLASS.	Date.
399,786	Schardt, B. and Jones, G	Lights, arc, special features	Mar. 19, 1889
394,791	Schefbauer, R.	Lights, arc, positive feed, gear-clutch	Dec. 18, 1888
396,342	Scheithauer, B	Batteries, galvanic	Jan. 15, 1889
387,010	Schmid, A	Magneto-electric	July 31, 1888
404,114	Schmid, A	Induction-coils	May 28, 1889
405,124 399,084	Schmid, A	Applications, generalElectrodes	June 11, 1889 Mar. 5, 1889
402,484	Schoop, P	Batteries, secondary	Apr. 30, 1889
393,125	Schulte, W	Applications, general	Nov. 20, 1888
395,851	Schwartz, L. H. A	Cordage, warping	Jan. 8, 1889
385,482	Scribner, C. E	Telephones, systems	July 3, 1888
385,528 388,453	Scribner, C. E Scribner, C. E	do	July 3, 1888 Aug. 28, 1888
388,454	Scribner, C. E	do	Aug. 28, 1888
388,791	Scribner, C. E	do	Aug. 28, 1888
391,762	Scribner, C. E	do	Oct. 23, 1888
393,396	Scribner, C. E.——————————————————————————————————	Valve controllers	Nov. 27, 1888
388,312 385,826	Sechrist, A	Batteries, galvanicCut-outs, mechanical	Aug. 21, 1888 July 10, 1888
388,078	Sedgwick, F	Tempering and annealing metals	Aug. 21, 1888
400,366	Sedgwick, F	Tempering and annealing, applications	Mar. 26, 1889
401,721	Sedgwick, F	do	Apr. 16, 1889
400,958 386,898	Seely, J. A Sellon, J. S	Conductors, underground Batteries, secondary	July 31, 1888
392,826	Sellon, J. S	do	Nov. 13, 1888
- 396.770	Sellon, J. S	do	Jan. 22, 1889
396,769	Sellon, J. S		
396,958 401,466	Sellon, J. S		
404,310	Sellon, R. P.		May 28, 1889
392,370	Sellon, R. P. and Mordey, W. M	Regulators	Nov. 6, 1888
389,532 405,609	Serson, J	Batteries, galvanic	Sept. 11, 1888 June 18, 1889
397,472	Seymour, J. B.	Stationery, paper clips	Feb. 5, 1889
402,986	Shafer, E. B	Telegraphy, fire	May 7, 1889
404,507	Shafer, E. B.	TransmittersInduction-coils	June 4, 1889 July 31, 1888
387,013 388,003	Shallenberger, O. B. and Byllesby, H. M Shallenberger, O. B	Meters	Aug. 14, 1888
388,004	Shallenberger, O. B.	do	Aug. 14, 1888
390,910	Shallenberger, O. B.	Regulators	
390,911 390,912	Shallenberger, O. B	Systems of distribution Magneto-electric	Oct. 9, 1888 Oct. 9, 1888
390,990	Shallenberger, O. B.	Systems of distribution	Oct. 9, 1888
394,728	Shallenberger, O. B.	Galvanometers	Dec. 18, 1888
397;392 398,457	Shallenberger, O. B.——————————————————————————————————	Magneto-electric Motors	
398,458	Shallenberger, O. B.	do	
404,566	Shallenberger, O. B	Transmission of power	
404,567 390,710	Shallenberger, O. B.		
3\$5,963	Sharp, E. A.	Air and gas engines. explosive	July 10, 1888
385,964	Sharp, E. A.	Railway signals	July 10, 1888
392,233	Shaver, G. F	Telephones, mechanical	Nov. 6, 1888
399,635 400,126	Shaw, F	Batteries, galvanic	Mar. 26, 1889
404,441	Shaw, H. F. and G. F	Locomotion	June 4, 1889
393,271	Shaw, N. H.:	Extinguishers, gas	Nov. 20, 1888
393,525 405,126		Igniting devicesdo	
397,443	Shaw, W. A	Batteries, secondary	Feb. 5, 1889
396,241	Shawhan, J. F	Lighting systems	Jan. 15, 1889
396,836 $401,761$		Heaters	
388,922		Magneto-electric	
394,302	Sheffield, G. V	Telegraphy, printing	Dec. 11, 1888
405,436		Medical and surgical, body-wear	
389,254 385,379		Locomotion	
394,139	Short, S. H	do	Dec. 4, 1888
394,887	Short, S. H	do	Dec. 18, 1888
396,618 398,661	Short S H	do	Feb. 26 1889
398,662	Short, S. H	do	Feb. 26, 1889
398,663	Short, S. H.	do	Feb. 26, 1889
401,221 401,796	Short S H	do	Apr. 9, 1889 Apr. 23, 1889
401,797	Short, S. H	do	Apr. 23, 1889

No.	Name.	CLASS.	DATE.
404,873	Short, S. H	Locomotion	June 11, 1889
385,576	Sibley, C. C	Conductors	July 3, 1888
388,592	Siebel, J. E	Incrustation	Aug. 28, 1888
396,897	Siegrist, A	Drop lights and hangers	Jan. 29, 1889
395,083	Siemens, W	Miscellaneous compositions	Dec. 25, 1888
399,291	Siemens, W	Conductors, lead-covered	Mar. 12, 1889
399,292	Siemens, W.	Galvanometers	Mar. 12, 1889
389,943	Silliman, R. F Silvey, W. L.	Conductors, underground	Sept. 25, 1888
398,906 398,907	Silvey, W. L	Lights, are, gravity feed, gear Lights, are, gravity feed, gear-clutch	Mar. 5, 1889 Mar. 5, 1889
399,088	Silvey, W. L.	Magneto-electric	Mar. 5, 1889
400,130	Silvey, W. L.	do	Mar. 26, 1889
402,990	Silvey, W. L	Motors	May 7, 1889
403,964	Silvey, W. L	Lights, arc, positive feed	May 28, 1889
396,176	Simpson, D. J.	Connectors	
388,731	Sims, J. W	Brakes	
389,608	Skinner, H	Air and gas-engines, explosive	
404,661	Slater, H. B	Motors	
386,936	Slattery, M. M. M	Systems of distribution	
391,923	Slattery, M. M. M.		
404,801	Slattery, M. M. M Slocum, E. L	Meters Telegraphy, fire	
392,641 393,402	Smith, A. C	Show boxes and cards	Nov. 27 1888
395,667	Smith, D. G	Railway signals	Jan. 1, 1889
393,590	Smith, D. W		Nov. 27, 1888
399,165	Smith, D. W	Stéam boilers, circulation	
393,526	Smith, E. L.	Electrolysis	Nov. 27, 1888
404,118	Smith, F. S	Lights, filaments and carbons	May 28, 1889
405,684	Smith, H. J. and Zalinski, E. L	Blasting fuses	June 18, 1889
399,091	Smith, H. W		Mar. 5, 1889
399,092	Smith, H. W.	do	
394,218	Smith, J. A	Organs	
394,621		LocomotionInsulators	Dec. 18, 1888 May 14, 1889
403,491	Smith, T. J.		May 14, 1889
403,492 395,187	Smith W R	Boats, buoys and safes	Dec. 25, 1888
401,225	Smith, W. F	Meters	Apr. 9, 1889
401,226	Smith, W. F		Apr. 9, 1889
392,698		Spring scales	Nov. 13, 1888
402,626	Smead, B	Annunciators	May 7, 1889
404,232	Snead, U	Girders and columns	May 28, 1889
394,413	Soley, W. H	Thermostats	Dec. 11, 1888
394,220	Sparrow, F. M		Dec. 11, 1888
394,307	Sparrow, F. M	do	Dec. 11, 1888
403,786   388,594	Speed, F. M. Spencer, L. W. and Jaquith, F. P.	Lights, arc, positive feed, gear-clutch	May 21, 1889 Aug. 28, 1888
396,439	Sperry, E. A	Cut-outs, electro-magnetic	Jan. 22, 1889
397,945	Sperry, E. A	Batteries, galvanie	
398,668	Sperry, E. A		Feb. 26, 1889
400,264	Sperry, E. A	Telegraphy, fire	Mar. 26, 1889
405,187	Sperry, E. A	Drills	June 11, 1889
405,188		Mining machines	
405,440	Sperry, E. A	Lights, are, gravity feed, clntch	June 18, 1889
405,441	Sperry, E. A	Magneto-electric	June 18, 1889
397,398		Vending apparatus	
397,875 397,474		Locomotion	
387,117		Systems of distribution	
392,470		Motors	
392,471		do	
392,890	Stanley, W., jr	Regulators	Nov. 13, 1888
404,120	Stanley, W., jr	do	May 28, 1889
402,200	Statter, J. G	Magneto-electrie	Apr. 30, 1889
401,664		Railway signals	
403,619		D in it was a large string	
394,221	Steinhilber A	Printing and vignetting	Ech. 26 1890
398,805 402,779	Steinhoff A	Igniting devices, automaticValve controllers	May 7 1889
394,734		Gearing	
394,735	Stevens, W. Land	Locomotion	Dec. 18, 1888
403,397	Stewart, J-	Lights, sockets and keys	May 14, 1889
400,139	Stewart, R. E	Magneto-electrie	Mar. 26, 1889
399,218	Stillwell, L. B.	Systems of distribution	Mar. 5, 1889
399,219	Stillwell, L. B.	do	Mar. 5, 1889
398,288	Stirling, C. C	Cut-outs, mechanical	Feb. 19, 1889
385,484	Stitzel, F. and Weinedel, C	Metal working, riveting	July 3, 1888
389,337	Stitzel, F. and Weinedel, C	Telegraphy, relays and sounders	Sept. 11, 1888

No.	Name.	CLASS.	DATE.
393,865	Stitzel, F. and Weinedel, C	Railways signals	
. 398,353 399,579	Stitzel, F. and Weinedel, CStitzel, F. and Weinedel, C	Railways, pneumatic Railway signals	Mar. 12, 1889
393,183	Stocker, W. F	Batteries, secondary, applications	Nov. 20, 1888
393,315	Stocker, W. F	Meters	Nov. 20, 1888
400,140	Stockly, G. WStone, R. C	Telegraphy, transmitters	
400,141 392,080	Stout, G. H	Batteries, secondary	
403,969	Streat, T	Locomotion	May 28, 1889
400,880	Street, S. T	Railway signals	
405,382	Stromberg, A Stuart, J. M	Telephones, switches	
402,043 387,265	Stuckert, J. F	Annunciators Alarms, fire	Apr. 25, 1888
403,972	Sturtevant, T. L	Steam boilers, feeders	May 28, 1889
390,993	Sutherland, J. B.	Railways, signals	
395,299	Sweet, D. F Tag, W. and Smith, S. C	Motors———————————————————————————————————	
389,421 399,168	Tag, W. and Smith, S. C	Igniting devices, manual	
404,877	Tailleur, G. E	Conductors, underground	June 11, 1889
392,832	Talbot, C. N	Telegraphy, fire	
405,621 404,745	Taylor, C. W	Dentistry, miscellaneous	June 18, 1889
401,472	Taylor, T.		
390,413	Tesla, N	Systems of distribution	Oct. 2, 1888
390,414	Tesla, N	Magneto-electric	Oct. 2, 1888
390,415 390,721	Tesla, N. Tesla, N.	do	
390,820	Tesla, N	Regulators	
396,121	Tesla, N	Motors	Jan. 15, 1889
401,520	Tesla, N	do	
405,858 405,859	Tesla, N	Transmission of power	
392,701	Thaxter, G. E.	Jgniting devices	Nov. 13, 1888
400,969	Thayer, H. B	Telephones, systems	Apr. 9, 1889
393,192	Thayer, R	Applications, general	
395,524 388,229	Thayer, R Thode, C. W. F	Applications, tools and machines Bolts	Jan. 1, 1889 Aug. 21, 1888
402,491	Thomas, B. F	Medical and surgical, body-wear	Apr. 30, 1889
403,624	Thomas, W. R	Separators	May 21, 1889
392,573	Thompson, C. H.	Batteries, secondary	Nov. 6, 1888
392,574 397,526	Thompson, C. H.——————————————————————————————————	Batteries, galvanic	Nov. 6, 1888 Feb. 12, 1889
401,801	Thompson, D. W	Valve-controllers	
401,606	Thompson, E. P	Lights, filaments and carbons	Apr. 16, 1889
401,607	Thompson, E. P.	Connectors	
403,308 385,388	Thompson, E. P.——————————————————————————————————	Connectors	July 3, 1888
337,932	Thompson, W. H.	Lights, systems and appliances	Aug. 14, 1888
385,384	Thomson, E	Heaters	
385,385	Thomson, E	do	7 1 0 1000
385,386 385,647		Meters	
386,441	Thomson, E	Heaters	July 17, 1888
387,123		Induction-coils	
389,265 389,779		Magneto-electric	
390,318		do	
391,437	Thomson, E	Systems of distribution	Oct. 23, 1888
392,765		Magneto-electric	
393,040 394,892		Bridges, girders and columns	
395,018	Thomson, E	Meters	Dec. 25, 1888
396,009	Thomson, E	Heaters	Jan. 8, 1889
396,010 396,011	Thomson, E	do	
396,011	Thomson, E	do	
396,013	Thomson, E.	do	Jan. 8, 1889
395,014	Thomson, E		
396,015 396,039	Thomson, E		
397,616	Thomson, E	Regulators	Feb. 12, 1889
398,912	Thomson, E.	Heaters	Mar. 5, 1889
398,913	Thomson, E	Magneto-electric	Mar. 5, 1889
393,914 399,800	Thomson, E	HeatersMagneto-electric	Mar. 19, 1889
400,515	Thomson, E.	Systems of distribution	Apr. 2, 1889
400,516	Thomson, E	do	Apr. 2, 1889

No.	NAME.	Class.	DATE.
400,971	Thomson, E	Motors	Apr. 9, 1889
400,972	Thomson, E	Induction-coils	Apr. 9, 1889
400,973	Thomson, E	Magneto-electric	Apr. 9, 1889
401,085	Thomson, E		Apr. 9, 1889
401,608 401,803	Thomson, E	Systems of distribution	Apr. 16, 1889 Apr. 23, 1889
403,157	Thomson, E	Heaters	
403,707	Thomson, E.	do	May 21, 1889
403,708		do	
406,010 399,801	Thomson, E. and Wightman, M. J.	Meters	June 25, 1889 Mar. 19, 1889
405,284	Thone, F	Magneto-clectric	
394,520	Thornycroft, J. I	Iudicators	Dee. 11, 1888
398,194	Timmis, I. Á	Batteries, secondary	
389,423 397,880	Tirrell, J. P Toulmin, M	Bells	
386,729	Townsend, L. and Auten, J. E	Telegraphy, kcys	
392,766	Trafford, W	Annunciators	Nov. 13, 1888
401,229	Trapp, É. A.	Telescopes	Apr. 9, 1889
394,797 385,390	Tregoning, J.	Magneto-electricBatteries, seeondary	Dec. 18, 1888
388,601		do	
389,676	Trippe, S. L	Batteries, galvanic	Sept. 18, 1888
395,761	Trott, S	Locomotion	Jan. 8, 1889
393,405		Lights, arc, gravity feed, clutch	
400,808 389,678		Cut-outs, mechanical	Apr. 2, 1889 Sept. 18, 1888
389,122	Turner, W. A	Railway signals	Sept. 4, 1888
400,520	Tuttle, C. R	Telephones, supports	Apr. 2, 1889
390,101	Tweedalc, E	Applications, general	Sept. 25, 1888
385,974 385,975	Vail T N	Telephones, systems	July 10, 1888 July 10, 1888
385,976	Vail, T. N	do	July 10, 1888
385,977	Vail, T. N	do	July 10, 1888
385,978		do	July 10, 1888
394,230 397,479		Lights, incandescent	Dec. 11, 1888 Feb. 5, 1889
390,921	Van Depoele, C. J	Motors	Oct. 9, 1888
393,275	Van Depoele, C. J	Motors Locomotion	Nov. 20, 1888
393,276	Van Depocle, C. J	do	Nov. 20, 1888
393,277 393,278	Van Depoele, C. J	do	Nov. 20, 1888 Nov. 20, 1888
393,317	Van Depoele, C. J	do	Nov. 20, 1888
394,035	Van Depoelc, C. J.	Regulators	Dec. 4, 1888
394,036	Van Depoele, C. J	Motors	Dec. 4, 1888
394,037 394,038	Van Depoele, C. J	Locomotion	Dec. 4, 1888 Dec. 4, 1888
394,039	Van Depoele, C. J	do	Dec. 4, 1888
394,417	Van Depoele, C. J	Motors	Dec. 11, 1888
394,525 396.310	Van Depocle, C. J	Locomotion	Dec. 11, 1888
396,311	Van Denoele C. J	Locomotion	Jan. 15, 1889
396,312		do	
396,313		do	
396,314		Motors	
397,451 398,294	Van Depoele, C. J	Locomotion	Feb. 19, 1889
399,882		Locomotion	
400,274		Gearing	
400,375 400,809	Van Depoele, C. J	Locomotion	Mar. 26, 1889
401,230		Motors Regulators	
401,231		Motors	
402,117		Locomotion	
103,009		Compositors	
403,010 403,011		Connectors	
403,800	Van Depoele, C. J	do	May 21, 1889
403,801	Van Depoele, C. J	do	May 21, 1889
404,324		Regulators	
404,325 405,626	Van Depoele, C. J	Locomotiondo	June 18, 1889
405,627	Van Depoele, C. J	do	June 18, 1889
405,628	Van Depoele, C. J	do	June 25, 1889
405,750		Modical and survival hadra man	
402,367 403,626	Van Enps. F. L	Medical and surgical, body-wear  Telegraphy, relays and sounders	May 21, 1889
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	NADLE.	CLASS.	DATE.
388,512	Van Gestel, J. T	Motors	Aug. 28, 1888
388,513	Van Gestel, J. T		Aug. 28, 1888
388,514 388,746	Van Gestel, J. T Van Gestel, J. T		
405,751	Van Gestel, J. T		
388,091	Van Rysselberghe, F	Telegraphy, reed	Aug. 21, 1888
388,092	Van Rysselberghe, F	do	Aug. 21, 1888
400,523	Van Rysselberghe, F. Vansant, J. & and Anderson, F. S.	Rheostats	Apr. 2, 1889
387,463 387,464	Vansant, J. A. and Anderson, F. SVansant, J. A. and Anderson, F. S	do	Aug. 7, 1888 Aug. 7, 1888
393,529	Vansize, W. B.	Telephones, systems	Nov. 27, 1888
10,989	Vansize, W. B (Reis. of 393,529.)	do	Mar. 5, 1889
386,512	Verstraete, E	Street cars	July 24, 188
403,802 389,123	Vetter, J. C	Batteries, galvanicBathometers	May 21, 1889
395,019	Von Hefner-Alteneck, F. and Hoffmann, C-	Magneto-electric	Dec. 25, 1888
386,281	Waddell, M	Blasting and fuses	July 17, 188
388,093	Waddell, M.		Aug. 21, 188
400,525 393,132	Wagner F. C.	Railway signals Meters	Apr. 2, 1889
399,224	Wagner, F. C	Regulators	Mar 5 1889
396,786	Wagner, G. G.	Registers	Jan. 29, 188
385,686	Wailes, J. S	Clothes lines	July 3, 188
395,932	Waite, H. E	Induction-coils	
405,334 386,225	Walker, G. W	Friction generators Batteries, secondary, applications	
392,836	Wallace, J. B	Batteries, galvanic	
401,394	Walsh, E., jr	Furnaces, accessories	Apr. 16, 188
401,521	Walsh, E., jr	Alarms	
392,244	Walter, H	Batteries, secondary	
403,158 397,320	Walter, H. E	RegulatorsElectro-deposition	Feb 5 188
405,515	Warde, G. H		June 18, 188
387,703	Warner, C. D	Clocks, electric	Aug. 14, 188
387,704	Warner, C. D		
399,954 391,285	Warth, A		
387,194	Waterhouse, A. G.	Regulators	July 31, 188
387,195	Waterhouse, A. G	do	July 31, 188
389,029		do	
389,030 393,088	Waterhouse, A. G	Galvanometers	Sept. 4, 188
391,568		Indicators	
396,632	Waters, B. E		Jan. 22, 188
395,096	Watson, A		
400,978 389,781	Watts, H. F	Heaters Sewage and night-soil	
387,467	Webster, W., jr		
397,407	Webster, W., jr	Electrolysis	Feb. 5, 188
398,101	Webster, W., jr	do	Feb. 19, 188
387,382	Weems, D. G	Locomotion	Aug. 7, 188
387,383 391,394		do	
393,280		do	
396,633	Weems, D. G	do	Jan. 22, 188
398,209		Street cars, steam	
387,610 385,393	Weisser, T.	Gas burners, incandescent	
398,560	Weller, F. A. and Rietzel, A. F		Feb. 26, 188
398,561	Weller, F. A. and Rietzel, A. F	do	Feb. 26, 188
397,260	Wellens, R	Valve controllers	Feb. 5, 188
396,124	Wells, C. H.	Locomotion	
390,930 393,596	Westinghouse, G., jr	Regulators Valves, steam-actuated	Nov 27 188
399,639	Westinghouse, G., jr	Systems of distribution	Mar. 12, 188
404,139	Westinghouse, G., jr	Locomotion	May 28, 188
10,944	Weston, E(Reis. of 381,304.)	Rheostats	July 17, 188
10,945 $389,124$	Weston, E(Reis. of 381,305.)		July 17, 188
389,125	Weston, E		
389,272	Weston, E		
389,273	Weston, E	Recorders	Sept. 11, 188
389,274		Galvanometers	
392,385 392,386	Weston, E	do	Nov. 6, 188
392,387	Weston E	do	Nov 6, 188
002,001	** Coton, 17	do	7.01. 01 200

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No.	Name.	CLASS.	DATE.		
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392,477	Weston, E	Galvanometers	Nov. 6, 1888		
392,478	Weston, E	Lights, incandescent	Nov. 6, 1888 Mar. 26, 1889		
400,378 400,980	Weston, E	Galvanometers	Apr. 9, 1889		
401,317	Weston, E	Magneto-electric	Apr. 9, 1889		
401,318	Weston, E	do	Apr. 9, 1889		
401,668 401,669	Weston, E	dodo	Apr. 16, 1889 Apr. 16, 1889		
403,311	Weston, E	Galvanometers	May 14, 1889		
403,312	Weston, E	do	May 14, 1889		
401,616	Wheeler, F	Locomotion	Apr. 16, 1889		
385,782 403,017	Wheeler, S. S	Cut-outs, mechanical Regulators	July 10, 1888 May 7, 1889		
403,018	Wheeler S.S.	Magneto-electric	May 7, 1889		
386,569	Wheelock, B. J. and J. W	Batteries, galvanic	July 24, 1888		
393,346 401,617	Whelan, J	Conductors, underground Galvanometers	Nov. 20, 1888 Apr. 16, 1889		
405,815	White, J. C	Railway signals	June 25, 1889		
401,527	Whitney, E. R	Cut-outs, thermal	Apr. 16, 1889		
399,716	Whittier, C	Applications, tools and machines	Mar. 19, 1889		
396,791 404,813	Whittingham, G. H. Widdicombe, R. H.	Motors	Jan. 29, 1889 June 4, 1889		
394,627	Widdifield, W. P. and Bowman, A. H	Car brakes	Dec. 18, 1888		
394,897	Wiegand, H. H	Batteries, secondary	Dec. 18, 1888		
387,276	Wieseman, A. G.	Clocks, electric	Aug. 7, 1888		
389,729 403,164	Wiest, J.	HeatersCapstan and windlass	Sept. 18, 1888 May 14, 1889		
386,099	Wightman, M. J. and Lemp, H	Cut-outs, thermal	July 10, 1888		
395,936	Wightman, M. J	Lighting, systems	Jan. 8, 1889		
393,282 389,037	Wildt, E. A. Wilkinson, E	Magnetic locks and boltsApplications, tools and machines	Nov. 20, 1888 Sept. 4, 1888		
390,329	Willatowsky, A. F. L		Oct. 2, 1888		
396,792	Williams, J. T	Locomotion	Jan. 29, 1889		
405,194	Williams, J. T	Applications, general	June 11, 1889		
10,949	372,441).	Applications, general	July 24, 1888		
386,860	Williams, P. G. and Roovers, A. W	do	July 31, 1888		
399,591		do	Mar. 12, 1889		
400,985 403,630	Willson, T. L	Annunciators Magneto-electric	Apr. 9, 1889 May 21, 1889		
406,015	Willson, T. L	do	June 25, 1889		
399,305		Cut-outs, thermal			
397,678 386,175	Wilson, F	Theatrical appliances Telegraphy, fire			
392,248	Wilson, J. C	Telephones, systems	Nov. 6, 1888		
392,838	Wilson, J. C	Recorders	Nov. 13, 1888		
395,101 395,102	Wilson, J. C	Telegraphy, fire			
402,120		Recorders			
402,639	Wilson, J. C	Relays and sounders	May 7, 1889		
405,235	Wilson, J. C	Telegraphy, fireIndicators	June 11, 1889		
395,862 389,626		Time checks			
391,446	Wiseman, A. G	Clocks, electric	Oct. 23, 1888		
404,457	Wisner, A. J.	Railway signals	June 4, 1889		
402,121 393,733	Woelk, E. A	Telephones, switchesLights, sockets and keys	Apr. 23, 1889		
401,095	Wood, F. E	Lightning rods	Apr. 9, 1889		
386,732	Wood, F. W. and Fowler, J.	Railways, traction, underground	July 24, 1888		
394,946	Wood, J. B	Telephones, calls	Dec. 18, 1888		
385,493 398,870	Wood, J. J	Drop-lights and hangers Lights, arc, special features	Mar 5, 1889		
385,894		Annunciators			
397,953	Wood, M. M	Drop-lights and hangers	Feb. 19, 1889		
404,667 400,028		Applications, tools and machines			
386,282		Locomotion			
387,839	Woods, G. T	Batteries, galvanic	Aug. 14, 1888		
388,803	Woods, G. T	Telegraphy, railway car	Aug. 28, 1888		
395,533 393,954	Woodward, H	Cut-outs, electro-magneticBatteries, secondary	Dec. 4, 1888		
393,955.	Woodward, H	do	Dec. 4, 1888		
394,090	Woodward, H	Batteries, thermal	Dec. 4, 1888		
390,544 385,494		Electrodes			
386,049	Wright, G. H	Railway signals	July 10, 1888		
-390,428	Wright, P	Relays and repeaters	Oct. 2, 1888		

No.	NAME.	CLASS.	DATE.
391,447 394,670 398,566 405,519 392,577 401,322 405,452 402,290 396,795 402,642 392,393 405,646 405,647 392,090 389,184 396,450	Wright, R. D Wright, W. H. S Wuerpel, M Wurts, A Wynne, F Yale, C. O Yarwood, M. C Yeiser, F Young, J Young, J Young, J. C Zalinski, E. L. and Smith, H. J Zalinski, E. L. and Smith, H. J Zipernowsky, C., Déri, M. and Bláthy, O. T Zech, O	Railway signals  Meters Locomotion Electro-deposition Knitting and netting, stopping Motors Annunciators Telegraphy, fire Lights, arc, gravity feed, clutch Blasting and fuses	Dec. 18, 1888 Feb. 26, 1889 June 18, 1889 Nov. 6, 1888 Apr. 9, 1889 June 18, 1889 Aug. 14, 1888 Apr. 30, 1889 Jan. 29, 1889 Nov. 6, 1888 June 18, 1889 June 18, 1889 June 18, 1889 Sept. 4, 1888

